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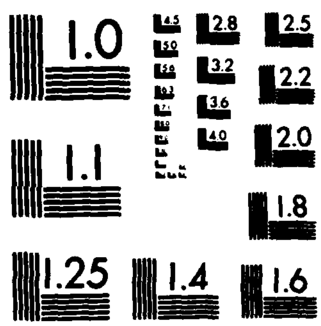

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NAVAL POSTGRADUATE SCHOOL

Monterey, California

THESIS

FY83 PROMPT PAYMENT ACT PERFORMANCE

by

Randall William Freitas

June 1984

Thesis Advisor: S. Liao

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The results of this study indicate errors in the collection of early payment and interest penalty data, and subjective

20. (Continued)

interpretations as to the causes for such payments and penalties. A review of these reasons and other problems leads to the development of several models to estimate the magnitude of such payments and to evaluate the relative performance of payment offices. This review also indicates the desirability of automation, administrative measures to reduce early payments and interest penalties, and improved reporting.

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FY83 Prompt Payment Act Performance

by

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Submitted in partial fulfillment of the
requirements for the degree of

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ABSTRACT

This thesis studies the problems of Coast Guard payment offices in making timely commercial invoice payments, and the accuracy of reports of interest penalties and early payments, required by the Prompt Payment Act and OMB Circular No. A-125.

The results of this study indicate errors in the collection of early payment and interest penalty data, and subjective interpretations as to the causes for such payments and penalties. A review of these reasons and other problems leads to the development of several models to estimate the magnitude of such payments and to evaluate the relative performance of payment offices. This review also indicates the desirability of automation, administrative measures to reduce early payments and interest penalties, and improved reporting.

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I. INTRODUCTION

A. BACKGROUND

With the implementation of the Prompt Payment Act (PPA) on 1 October 1982, a common invoice payment policy was established for all federal agencies defining late, early, and on-time payments of invoices. Reporting and some measurement requirements were established both in the Act itself and in the implementing instructions issued by the Office of Management and Budget (OMB) in the form of Circular No. A-125. Now that the FY83 Federal agencies' reports have been compiled, they must be internally evaluated, verified, and analyzed to determine that the measurement techniques are reliable, whether the results or projections indicate the existence of an invoice payment problem, and if so what should be done to correct it.

B. OBJECTIVES OF THE RESEARCH

The objectives of this research are to (1) examine the Coast Guard (CG) invoice payment process, (2) analyze the FY83 PPA reports of one automated payment office (for which FY83 PPA reports indicate unacceptable payment durations) and one manual payment office (which has very desirable payment results according to the FY83 PPA reports) and compare their invoice payment process, (3) examine the Coast

Guard sampling technique used to project the magnitude of early payments, and (4) propose changes where considered necessary.

C. SCOPE, LIMITATIONS AND ASSUMPTIONS

This research is focused upon Coast Guard invoice processing procedures, invoice sampling techniques, internal control systems, and how they impact upon the Coast Guard's Prompt Payment Act report. Only processing of invoices subject to the Prompt Payment Act will be specifically addressed. This approach will maintain the validity of this research in relating the Prompt Payment Act annual report to the internal control systems and measurement techniques used at payment offices.

The major obstacle to obtaining research data was OMB's refusal to release Federal agency's annual PPA reports prior to their release to Congressional Committees in March 1984. Despite Congressional intercession in January 1984, the requested reports were not received.

Although such research would normally benefit greatly from using judgemental or statistical audit techniques for compliance with internal control, proper interpretation and recommendations would have been highly suspect to error given the conditions for FY83. The major reasons for deciding against using judgemental or statistical audit techniques included the following:

a. major personnel turnover rates at payment offices,

b. inconsistent and changing internal control procedures,

c. a general lack of initial familiarity and agreement on the proper interpretation or knowledge of the PPA, at all levels (managerial, supervisory, and below),

d. a total lack of internal controls related to PPA requirements until well into FY83 and a corresponding lack of accurate data for this period,

e. the time delay between when such auditing techniques could have been applied by this researcher, the age of data being tested, and continuing change of internal controls,

f. an inordinate amount of extra work educating the business community on the provisions of the PPA,

g. and changes from totally manual to automated invoice payment procedures at CG District 8.

D. RESEARCH METHODOLOGY

1. Literature Review

Previous research internal to the Coast Guard has been primarily and necessarily limited to the development of standardized means to collect the data necessary for external reporting and to insure payment offices compliance with the PPA, A-125, and Department of Transportation (DOT) instructions. Several payment offices have recently been audited by the DOT inspector General's Office and subsequent reports have been reviewed. All CG payment offices' annual PPA reports with sample data for early payment determinations were also located during initial literature searches and a research visit to CG Headquarters.

Research on the Prompt Payment Act and invoice payment procedures has expanded since enactment in May 1982, and was made available through DLSIE, NAVFAC, and GAO.

2. Research Trips

The primary modes of research were through inquiry, confirmation, and documentation at two CG District offices (payment offices) to verify PPA report figures, and observe the invoice processing procedures and internal control systems. These visits allowed for direct observation of the individual steps necessary to process an invoice: date stamping, review for accuracy, matching with a purchase order document, calculating due date, scheduling for payment, internal controls, data collection for reports, invoice rejection procedures, interest payment procedures, segregation of duties, etc.

E. THESIS ORGANIZATION

Chapter II reviews CG commercial invoice processing procedures, and the framework of CG accounting procedures and instructions for compliance with the PPA.

Chapter III provides a review and analysis of CG early payment data, and statistical sampling techniques for collection of this data.

Chapter IV reviews and analyzes CG interest penalties data.

Chapter V presents and reviews the invoice processing and reporting procedures and organization of CG District 8.

Chapter VI presents and reviews the invoice processing and reporting procedures and organization of CG District 12.

Chapter VII summarizes this study, and draws conclusions from which recommendations are made to improve invoice processing procedures and PPA reporting.

II. FRAMEWORK

A. CG ACCOUNTING STUDY

1. Organization

Under the Budget and Accounting Act of 1970, each executive agency head has the responsibility for establishing and maintaining adequate accounting and internal control systems in conformance with accounting requirements prescribed by the Comptroller General of the United States. Operating within the Comptroller General's requirements, the Office of the Secretary of the Department of Transportation (OST) has prescribed uniform accounting principles and standards for agencies within DOT. The DOT Voucher Examination Manual, DOT 2750.1, establishes invoice examination and payment procedures which are further defined within the CG for all of the payment offices, by the CG Comptrollers Manual Volume 1 (Accounting), COMDTINST M7300.4, and COMDTINST 7200.1 Series, Cash Management. Each payment office then implements any supplemental administrative procedures necessary for compliance in its Operation Plan (Oplan) and other instructions for subordinate units.

2. Objectives

The four main objectives of the CG accounting system are to:

a. provide meaningful and timely financial information in managing the CG at all command levels,

b. provide control of and accountability for all resources the CG is responsible for,

c. provide reliable accounting data to support budget requests and financial information required by the Office of Management and Budget (OMB), and

d. provide for reconciliation of CG accounts with the Treasury Department [Ref. 1: p. I-2-1].

3. Features

The principal features used to implement these objectives include:

a. a decentralization system of cost accounts in each District office designed to meet their daily management requirements.

b. the integration of reciprocal accounts maintained at CG Headquarters,

c. accrual accounting,

d. control techniques to prevent obligations or expenditures from exceeding budgeted or appropriated amounts, and

e. compliance with the requirements of Section 1311 of the Supplmental Appropriation Act of 1955 for the recordation and reporting of financial transactions as obligations [Ref. 1: p. I-1-1].

Cost centers are established primarily by operating units, organizational components, programs, or projects. Administrative Target Unit Identification Numbers are assigned to these centers for identification. Within each Administrative Target Unit, individual cost accounts, commonly called Operating Guides (OG's), (consistent with those at the District and Headquarters levels) are utilized

for the classification and distribution of costs. Cost accounts are further defined by object classes according to the nature of actual expense such as travel, personal services, materials, etc.

Costs are also collected for each operating and administrative organizational unit in the CG since many units are multi-mission, thereby spanning several administrative target center costs classifications. Each unit is assigned a five digit OPFAC (Operating Facilities) number used to collect the cost of operating a unit. Costs are accumulated on an end-user basis where the benefitting unit is assigned the expenses incurred for or by it.

B. CASH MANAGEMENT

1. Objectives

The objectives and policies of CG cash management parallel those of OST, OMB, and the Treasury Department. For accounts payable these objectives include:

a. scheduling of disbursements to insure payments are made on time, but not later than the due date,

b. the taking of discounts when earned and advantageous to the Federal government, and

c. compliance with Prompt Payment Act (PPA) requirements [Ref. 1: p. I-2-3].

2. PPA Requirements

All PPA and OMB Circular No. A-125 requirements have been incorporated into Part IV, Chapter 4, Types of

Payments - Requirements and Procedures, CG Comptroller Manaul, Volume 1. For purposes of brevity, the PPA and Circular No. A-125 have been appended for reference.

C. PRESCRIBED COMMERCIAL PAYMENT PROCEDURES

The receipt of an acceptable invoice initiates the payment process. Upon initial receipt it is examined to insure that the items were ordered by an authorized official, normally by matching the invoice to a purchase order, contract or other authorization. A comparison of unit prices, extensions, and footings is then made. If an error is noted in the invoice, the payment office is authorized to make downward corrections of any dollar amount, and upward corrections of up to $30. Evidence of receipt of the items ordered is then verified. The receipt of materials is documented by a receiving report from the receiving unit, which notes any differences in the number or type of materials accepted. (Under Fast Payment Procedures proof of receipt is not necessary.) Partial payments are specifically prohibited unless authorized in the contract or purchase order.

If the vendor has offered a discount, and if still within the discount period, it is computed to see if the terms are advantageous to the Federal government. If so, then the invoice is scheduled for payment on the last day of the discount period; if not advantageous, then it is scheduled for payment on the regularly computed due date.

The computed due date is 30 days from the latter of the date of receipt of a proper invoice or the date of actual receipt of the materials or services. For cash management purposes the invoice should not be paid any earlier than four days prior to the computed due date. A 15 day grace period after the due date is authorized for administrative considerations during which an invoice may be paid and it is not considered late. On the 16th day and beyond, interest must be paid to the vendor, computed from the due date and for up to one year. Interest penalties less than one dollar are not paid.

Prior to the actual scheduling of payment for any commercial invoice, the payment holdup and undelivered order (UDO) listings are checked. This prevents payments to vendors indebted to the Federal government, and avoids duplicate payments or payments when a valid obligation is missing.

D. ANALYSIS

The annual PPA/Circular A-125 required report of early payments and interest penalties, while having a high degree of correlation with CG cash management objectives, is not highly correlated with CG accounting system objectives. The report only indicates a problem exists but does not give any specific indication as to where it is in the system. It is not timely from a management point of view because it does not directly assist in the prevention of late payments.

In addition to the above, the data may still be inaccurate despite the best efforts in designing a process measure with some correlation to performance objectives. Account classification errors (for interest penalties), if they are material in amount, can cause problems in the planning and budgeting cycles. Therefore it is important to determine where and why such errors occur--from organizational or behavioral aspects.

III. EARLY PAYMENTS DATA ANALYSIS

A. MEASUREMENT AND REPORTING

Although early payments are not mentioned in the PPA, in promulgating Circular No. A-125 in compliance therewith, OMB realized that the PPA "...implementation must be consistent with sound cash management and related Treasury regulations" [Ref. 2: p. 1]. Circular No. A-125 does not specifically define early payments, but it does require the reporting of payments made five or more days before the due date except for cash discounts.

In June 1982 in response to OMB's request for comments on the then proposed Circular No. A-125, the Department of Transportation objected to the need for early payment reports because they were not addressed by the PPA and the late payment reporting alone would be an added strain upon already overburdened accounting resources throughout the Department and its agencies. OMB was asked to recognize the impact upon staffing ceilings, budget authority, and other recent requirements such as the increased emphasis on debt collection. Despite these concerns and objections, early payment reporting requirements remained. The long term goals of improved cash management and timely payment outweighed the immediate problems of adjusting to these new

requirements. "Federal agencies have a responsibility to manage resources efficiently, including the use of sound businesslike cash management practices..." to reduce early and late payments [Ref. 3]. OMB did, however, authorize the use of statistical sampling to reduce the time and cost of measuring and reporting the number, amount, and frequency of early payments. Table 1 (Appendix C) shows the number of invoices and dollar amounts subject to sampling at the Districts, and also gives an indication of the processing workloads.

B. CG SAMPLING FOR EARLY PAYMENTS

On 25 August 1983 Commandant (G-FAC) specified the sampling technique to be utilized by all CG payment offices in determining the necessary data for FY83 early payment reporting [Ref. 4]. This sampling technique specified the SF-1166 (Schedule of Payments form) as the sampling unit from the period 1 October 1982 through 31 July 1983.

Three weeks of each month were randomly selected utilizing a random number table, and the first SF-1166 prepared for each selected week became the sample. From each SF-1166 selected, the first five commercial invoices (for which discounts were not taken) were audited for payment due date, check issuance date, the amount of payment, and the voucher number. Billings received at separate times from one voucher were treated as separate invoices even if consolidated for actual payments.

This sampling technique resulted in a sample size of 150 invoices from each CG payment office (10 months x 3 SF-1166's per month x 5 invoices per SF-1166). This data was extrapolated to estimate a full twelve month period, then critically reviewed and adjusted with the intent of providing DOT with an accurate estimation of the total amount of early payments made. Unfortunately, these adjustments further weakened whatever validity the original sampling procedures provided, as discussed below.

1. Discussion of Valid Sampling Techniques

The Coast Guard's use of a judgemental approach for sample selection is improper, given the statistical evaluation for which it is intended, and the OMB requirement that statistical sampling be used. "Only random selection is acceptable when the auditor intends to evaluate a population statistically" [Ref. 5]. Random selection allows one to ignore the differing numbers of invoices or schedules at each payment office thereby standardizing the sample size for all payment offices.

In an attempt to provide for this required random sampling (G-FAC) randomly selected the weeks but then haphazardly selected the schedule and vouchers on these schedules. To compound the problem subsequent vouchers on these schedules were selected utilizing another judgemental

method known as block sampling. Unfortunately the judgement used in selecting samples failed to properly counteract potential biases in the data.

Non-random scheduling of payments on the SF-1166 combined with the selecting of SF-1166's on the first work day of any selected week, are two major biases noted within the FY83 sampling process. It was discovered that SF-1166's are not necessarily randomly distributed. Some payment schedules will first list all SF-44's, or all invoices attributable to a single ship or other end-user for which the payment is being made. A scheduler may also start off every week or each day processing the SF-44's first just because they are simple to process and it clears his desk more rapidly.

The other major bias noted is that the block selection of five consecutive vouchers may only pick up the low dollar, easily processed SF-44's for the reasons noted above. Such biases can destroy the samples representativeness of the population, and the validity of any generalization based thereon.

The use of judgemental sampling arose partially from the desire to design a standard system easily implementable across both manual and automated accounting systems at payment offices with varying capacities and limitations. The other reason for using judgemental sampling may have

been attributable to an overally liberal interpretation of OMB Circular No. A-125, so as not to overburden accounts payable staffs any further.

2. Improved Sampling Technique

In order to fully comply with OMB requirements for statistical sampling, a unique number associated with each individual invoice would be necessary. Given the number of invoices, staffing levels, and predominance of manual accounting within the Coast Guard, such a task is reasonably impracticable. When one considers the use of this data and other less expensive sampling techniques available, which will still provide for adequate Congressional and managerial review of early payments, then at first glance statistical sampling appears to be too costly in both time and resources. Another consideration at the agency level should be to integrate the early payment sampling technique with that used to meet GAO sampling requirements for invoices less than $750. (The sampling technique for invoices less than $750 is specified in COMDTINST 7560.2C of 9 September 1981).

For early payment statistical sampling it is recommended that systematic selection be utilized. A systematic selection process begins with the calculation of an interval by dividing the total population size (estimated number of vouchers scheduled for payment during desired time

span) by the total number of samples desired. Because the number of vouchers varies widely between payment offices, this calculation must be made for each payment office. For instance, for the 9th District the estimated population size for the desired time span is approximately 1522 vouchers and the desired sample size is 150. The interval computes to 10, but before applying this interval the first voucher to be sampled must be randomly selected.

The starting voucher number within the computed interval must be randomly selected through the use of a random number table or computer generated random number. If the first number selected is 7 and the voucher numbers for the FY begin with 4000, then 4007 would be the first voucher selected. From this voucher, one payment should be randomly selected, to avoid the previous bias of block sampling. The next voucher sampled would be 4017, and so forth until the desired sample size has been drawn.

For those payment offices with manual accounting systems, adoption of the above sampling improvements is recommended, and the capability for statistical or 100% sampling should be a part of all automated accounting systems. With the adoption of improved manual sampling techniques, more automated accounting systems, and increased efficiency in paying commercial invoices, the need for

(G-FAC) review and adjustments to early payment samples should diminish and eventually be eliminated.

C. FY83 REPORT OF EARLY PAYMENTS

The following discussion of adjustments made to the FY83 early payment data is to explore the need for increased automation of accounting, increased levels of personnel performance, and an increased understanding of statistical sampling techniques, and the PPA.

The original sampling data revealed, upon extrapolation to an annual early payment figure, approximately $217 million in early payments Coast Guard wide, yet a figure of only $70 million was reported to the Department of Transportation. Whether one uses $217 million or $70 million, CG early payments cost the Treasury nearly twice the amount paid by the CG in interest penalties for FY83.

(G-FAC) realized that the $217 million estimated from sampling was not a true representation of early payments, attempted to remove sampling errors and arrive at an ajusted early payment amount, felt to be consistent with other calculations, reviews, and professional judgement. The largest downward adjustment made was $62 million based upon a review of the largest dollar invoices sampled. An average of four to five such invoices were reviewed per payment office, and 75% of these invoices had been inappropriately contained in the sample population, although they were not

subject to the PPA, or payment due dates were improperly calculated and invoices were no longer early payments. Some valid invoices with improper due dates were actually late payments on which no interest had been paid, and they were further excluded from being reported as late payments as well.

The general intent of this adjustment, to correct the sample population, is concurred with except that for each rejected sample a replacement sample should have been drawn. Also to only audit the four or five largest invoices from each payment office sample further biases the sample findings. In effect, the sample results have now been skewed downwards.

The second adjustment to the early payment figure, now at $155 million, was to remove invoices with payment due dates on Saturdays or Sundays that were paid five or six days early respectively. This adjustment was calculated at $16 million, giving a total early payment figure of $139 million. The dollar amount of early payments data utilized for statistical analysis, later in this chapter, was taken at this point and is shown in Table 2.

The third adjustment assumed that the entire sample was in error in the same ratio as the large invoices as noted in the first adjustment. This initially was assessed as a $22 million reduction but was revised to $11 million because the

use of the same error ratio as the first adjustment was considered somewhat biased, and incidentally brought the final total into agreement with another approximation of early payments computed by using 49.1% of the total dollar amount subject to the PPA. Documentation of the validity of this percentage was not available.

The final adjustment to the total dollar amount of early payments was a reduction of $57 million for the estimated percent of outlays not subject to the PPA, such as FY82 invoices paid in FY83. This brought the net figure for early payments down to $71 million. Another $1 million just disappeared between the calculation sheet and the final report sent to DOT showing $70 million in early payments.

D. STATISTICAL ANALYSIS OF CAUSES FOR EARLY PAYMENTS

The primary reasons for early payments given by (G-FAC) were "...high invoice volume combined with manual processing systems and a emphasis on minimizing late payment penalties..." [Ref. 4]. The following analysis of early payment data tests these reasons, and explores others. Because the other emphasis of this research is to also compare the invoice payment performance of two Districts, the overall early payment data analysis has been limited to the samples of the twelve Districts. This is also desirable from the standpoint that all Districts are operating under very similar conditions while the other ATU's vary

significantly in mission. The correlations computed and referred to are on a scale of -1 to +1.

1. Manual Processing Systems

If manual commercial invoice processing systems were a major reason for the magnitude of early payments, then one would expect automated payment offices (Districts 8 and 13) to have fewer early payments. This unfortunately cannot be directly tested due to the lack of previous manual processing data for those Districts now automated, and these systems were implemented during the latter half of the fiscal year. Since sampling data collection ended in July, no effect from automation would be apparent for FY83. One could argue that Districts 8 and 13 early payment figures could have been much worse had it not been for automation being implemented during FY83, but given the added learning necessary and the partial year conversion the true effects are not yet apparent. Another possibility is that the manually prepared reports for both early payments and interest penalties are in error, while an automated system with proper field edits and other internal controls is almost flawless.

2. Emphasis on Late Payments

A review of (G-FAC) files shows many letters to payment offices regarding interest penalties and no letters concerning early payments. While the stated emphasis was

therefore on late payments, statistical analysis of the sampled data tested if this emphasis was continued at the payment offices. If this emphasis had been operationalized then one might expect late payment interest penalties to vary inversely with the amount of early payments. Statistical analysis of these two populations (early payments and interest penalties) provides a positive sample correlation coefficient of 0.6602, indicating a positive relationship between the amount of early payments and interest penalties, given in Tables 2 and 4, Appendix C. In other words, they do not vary inversely as an operationalized emphasis on late payments would lead one to believe.

This apparent conflict may be due to the simultaneous influence of other factors such as the number of personnel, number of units, and geographic area of responsibility, or is indicative of a consistent lack of internal controls at a payment office experiencing a large proportion of both interest penalties and early payments!

3. Effect of Invoice Volume

If the volume of invoices processed for payment is a major reason for the magnitude of early payments, then a strong correlation between the number of invoices per annum and the number paid early should exist. A positive correlation of .4196 was given by the sample data. This correlation, however, does not take into account the

possible combined effect of the number of personnel available to process these invoices.

The sample correlation coefficient for the number of personnel authorized for accounts payable and the number of invoices at each District (see Table 1, Appendix C) shows a very strong relationship (r=.7141). (A necessary assumption here was that the percentage of manhours attributed to processing commercial invoices was equal among Districts, and personnel performance levels were nearly equal.) This strengthens the statement that the number of invoices processed is a major contributing factor to the number of early payments.

4. Combined Effect of Personnel and Invoices

Since the simultaneous effect of the above factors on early payments may be different than what the individual comparisons indicate through the calculation of correlations, a multiple regression was performed. The intent here is to briefly introduce the use of such a model as a means of properly managing factors contributing to early payments.

Early payments were regressed onto the number of personnel authorized and the number of invoices annually scheduled for payment at each payment office. Two regression equations were developed from this, which allows one to estimate the number of and dollar amount of early

payments given the number of personnel and the number of invoices.

The sample multiple correlation of personnel and invoices to the dollar amount of early payments is .3241 (coefficient of determination = .1033), meaning that the amount of early payments is positively related to these factors, but not statistically strong enough for meaningful analysis. The discussion of this multiple regression which follows is provided only as an example of how such a regression can be utilized to interpret PPA data. More accurate FY84 PPA data should provide for a stronger coefficient of determination and useful multiple regression equation. Therefore, the equations discussed below are for the purpose of illustration only.

The regression equation which resulted from the sample data is: Estimated \$ Amount of Early Payments = 14,122,397 - 1,641,915X + 145Y, where X is the number of personnel authorized at the District and Y is the number of invoices scheduled for payment per annum at each District. A review of the early payment estimates using this equation indicates little resemblence to the reported amounts, possibly due to inaccurate or unrepresentative data, or other influencing factors. Despite this, several observations can be made from the FY83 data.

The sample multiple correlation of personnel and invoices to the number of early payments is .4378

(coefficient of determination = .1917). This still indicates a positive relationship exists between these factors. The regression equation is: 11874 - 886X + .2738Y.

Districts 8, 12, and 17 according to the regression equation estimates, had the three highest estimated early payment figures while according to the sample data they were two of the top three. Why the 12th District has such a low early payment amount by sample, with the second highest average invoice processing number per person is subject to question. This also draws attention to why the 13th District would be estimated sixth when sample data indicates it has the third largest amount of early payments and the second highest amount of dollars subject to the PPA. Reviewing the number of invoices (factor Y), the 13th District has almost half as many invoices per person for almost the same amount of dollars subject to the PPA as the 17th District. All else being equal, the 13th District should have a lower dollar amount of early payments than the 17th District.

The manager of contributory factors, such as personnel or the geographic area of responsibility for paying invoices, can use such an equation to estimate the quantifiable impact of assigning/deleting billets, or of transferring commercial invoice processing responsibilities

to or from any payment office. For instance during FY83 the 11th District was reportedly two persons over billeted and their reported early payments were significantly lower than the model estimate based upon authorized billet levels. The reduction to early payments is more than the amount expected from using the model equation, but is well within the confidence interval limits at a 90% level of confidence.

The variable coefficients of this regression equation can help quantify the benefit of added personnel on early payments. Here each additional employee assigned to accounts payable should cause a decrease in early payments in the amount of approximately $1.642 million! If the number of days invoices are paid early remains unchanged with the addition of another person (an average of 13.3 days early), the savings to Treasury Department is:

$$\$1,641,915 \times (13.3/365) \times 10\% = \$4983$$

5. Summary

Benefits will also accrue in other areas of accounts payable as will be seen in the late payment regression equation. Given the accuracy and reliance upon such equations, a cost/benefit approach to staffing may be considered viable. It should be noted, however, the PPA reports and data collection supporting them do not take into account the costs of overtime and SADT personnel.

The potential for the use of a regression model in this area as a management tool should be developed based upon FY84 data when compiled. The FY84 data should contain fewer errors and sample biases, thereby resulting in a more representative sample and better regression equation. As was noted earlier, explanations not supported by data analysis indicate the subjectiveness of the explanations, errors in the data, or effects of other factors not considered. Regression analysis can help bring about a better understanding of the problems, their interrelationships, and if corrective actions are having the desired results.

IV. INTEREST PENALTIES DATA ANALYSIS

A. MEASUREMENT AND REPORTING

Both the PPA and OMB Circular No. A-125 require the reporting of the following data relating to late payments:

1. the number and amount of interest penalties paid,
2. the frequency of interest penalty payments, and
3. the reasons these interest penalties were not avoided by timely payment.

Circular No. A-125 also requires each Federal agency to provide an analysis of progress made towards improving timely payments, although the PPA only requires OMB to provide an analysis showing the progress made by each agency in reducing interest penalty payments. Once again the difference between the PPA and OMB requirements can be attributed to the desire for the overall improvement of cash management, and not just the reduction or elimination of late payments.

Circular No. A-125 also authorizes the use of statistical sampling to reduce the time and cost of measuring and reporting the number, amount, and frequency of interest penalties. Because interest penalties result in an actual payment, and knowing the need to manage and report such penalties, a separate object class is used to account

for interest penalties. Therefore, statistical sampling has not been utilized nor required in the collection of this information.

B. INTEREST PENALTIES DATA COLLECTION

All the requirements for interest penalty reporting required by OMB were passed down to CG payment offices by COMDT (G-FAC) in Change 140 to Volume I of the Comptroller Manual (CG-264) on 28 September 1982.

When an invoice is processed and the payment date necessitates an interest penalty, the amount of interest is charged against object class 4301. Within forty-five days after the end of the Fiscal year, the cumulative amount in the account, and the number and relative frequency of penalties charged to it are reported from each payment office to Commandant (G-FAC). Each paying office must absorb these penalties within their OG-30 funding, unless otherwise specified. No adjustments were made to the interest penalty reports prior to compilation and reporting to DOT and OMB.

Problems do, however, exist in the accurate capture of interest penalties in object class 4301, primarily due to the lack of effective internal controls at the manual payment office. These problems are predominantly behavioral in nature and are depicted in the review of the 12th District In Chapter V.

C. FY83 REPORT OF INTEREST PENALTIES

The total dollar amount of interest penalties reported paid CG wide was $138,468. This figure represents only .0128% of $1,078,933,000, the total dollar amount paid to vendors subject to the PPA. In other words, payments totaling approximately $38 million were an average of 13.3 days late resulting in the $138,468 in interest penalties to vendors. The average invoice amount paid late is calculated at $2787, and the average interest penalty only $10.16 per invoice. The cumulative dollar amount of invoices paid late represents only 3.5% of the total dollar amount subject to the PPA. If the interest penalties paid were averaged over the total number of invoices processed, it costs approximately $0.22 per invoice ($138,468/630,000 invoices).

While the cumulative amount of interest paid seems insignificant, there were some internal control problems noted in the manual processing of invoices that can and did lead to the reporting of inaccurate figures, and also lead to more late payments than were necessary. Since these errors were not known, and their magnitude not readily quantifiable, no major adjustments were made to the payment offices reports of interest penalties prior to compilation for forwarding to DOT. The only differences noted at that time were those between Commandant (G-FAC) records of payment office's 4301 accounts and the amounts reported by

the payment offices' annual PPA reports. The cumulative error was only $48. This unfortunately does not indicate the accuracy of the 4301 account.

For instance, (G-FAC) records for the 12th District indicate $7611 in interest penalties, and the 12th District's annual PPA report reflected $7707. Yet upon review of the District's interest penalty work sheets, approximately $12,700 was actually paid in interest for FY83. The failure to charge all interest penalties paid to object class 4301 is indicative of internal control problems peculiar to a manual processing system and a poorly designed automated system. These problems are discussed in Chapters V and VI.

D. ANALYSIS OF CAUSES FOR INTEREST PENALTIES

The primary reasons given in the CG FY83 PPA report for incurring interest penalties, ranked according to frequency, were:

1. highly manual systems combined with scarce personnel resources,
2. delays in receiving the received report,
3. a defective purchase order, contract receiving report, or invoice approval,
4. failure to notify the vendor of a defective invoice,
5. delays in receiving an approved invoice at the paying office,
6. delays in receiving the purchase order or contract at the paying office,

7. the taking of discounts in error, and

8. computer system problems.

The following analysis of interest penalty data tests these reasons (See Tables 1, 4, and 5, Appendix C). Some of these reasons are actually symptoms of other problems as will be seen upon specifically reviewing the 8th and 12th Districts.

1. <u>Manual Processing Systems</u>

If manual processing was the primary reason for the magnitude of interest penalties, then automated payment offices (Districts 8 and 13) should have fewer interest penalties in proportion to influencing factos also common to manual payment offices.

The data did not support this assumption, possibly due to the limited amount of data, and because the automated systems had only been automated for less than half of FY83. There was also no PPA data for any previous fiscal years at the automated offices to compare with their FY83 performance. No statistical analysis was attempted between the two automated payment offices and the manual payment offices.

However, in support of manual processing as a cause of interest penalties, most of the reasons given for interest penalties are directly related to manual processing difficulties. Unfortunately, automation of the payment

office alone does not speed the receipt of receiving reports, approved invoices, or contractual documents, and difficulties in these areas can be expected to continue. If automation of auditing techniques is indicative of the time saved due to automation, then a time savings of approximately 20% can be expected from automation, while the greatest benefits will be in the accuracy of computations and reports.

2. Receiving Reports

The delay in receipt or receipt of defective receiving reports is the second major cause cited for interest penalties. These causes are the result of many factors; deployment of vessels for which goods are received at supporting facilities, manual processing of receiving reports at receiving activities, lack of training causing late/improper prepration of receiving reports, inadequate personnel resources at the unit and paying office to process reports, conflicting priorities at the unit livel, and others.

Every paying office should be aware of the receiving report problems peculiar to their area of responsibility and must strive to search out means of improvement through increased training, awareness, and streamlined/improved processing procedures. As an example, a major cause of the magnitude of interest payments at the 8th District is the

late submission of receiving reports on large dollar contracts. Little or no follow through by the contracting office is initiated to insure delivery was made and the receiving unit has forwarded the receiving report. This example demonstrates the need for all offices and units involved in contracting, payment, or the receipt of goods and materials, to understand the basic provisions of the PPA.

Another example of this problem is when afloat units are berthed at non-CG facilities, such as NSC Oakland. During deployment, NSC Oakland receives and warehouses materials for the 378' cutters but does not forward any notification of receipt to either the ship or the 12th District. Since all Federal agencies must comply with the PPA, situations such as this should be easily resolved. Unfortunately in this instance corrective actions have not been completed. To insure the receiving unit can match the delivery to a purchase order or contract, the inclusion of the purchase order number or contract number should be required on the vendors' shipping documents.

Delays in matching receiving reports to payment authorizations may also be internal to a paying office. The report may go to the wrong voucher examiner, may sit idle while awaiting receipt of the purchase order, or the examiner works on the auditing and scheduling of documents already matched.

Receiving report problems will not disappear, but should greatly subside with increased vendor and CG awareness and training. Receiving reports are the second greatest problem attributed to interest penalties in the CG, but they are also the most vulnerable to control measures and other improvements that can be implementated at the paying office level and below.

3. Defective Documents

Defective purchase orders, contract receiving reports, and invoice approval are listed as the third major reason for interest penalties.

The major problem with purchase orders is they often fail to take into account transportation charges and the paying office has no authority to increase the purchase order to cover such charges. Some paying offices are doing so, up to thirty dollars under a provision in the CG Comptrollers Manual Volume I which allows upwards adjustments of this amount for errors in unit prices, extensions, and footings, but no specific mention is made to include transportation charges. A need for specific authorization of increasing purchase orders to cover legitimate transportation charges of any dollar amount is highly recommended to preclude the delays involved in having the ordering unit increase the purchase order and then notify the paying office thereof.

Contract receiving reports and invoice approvals often are dated when signed, as opposed to the actual date of receipt of the goods and services.

4. Notifying Vendor of Defective Invoice

OMB Circular No. A-125 requires that notification of defective invoices by suitably documented, and the automatic use of a form letter to return such invoices will preclude potential difficulties, normally save time, and can become consistent from a policy standpoint.

Defective invoices often lack reference to a purchase order or contract number, or have differing descriptions of items identified on the contractual document. Errors of this nature must be resolved, or invoices returned to the vendor for correction within fifteen days of receipt. If not, the government foregoes its ability to stop the clock from running on the due date under the provisions of OMB Circular No. A-125.

Some CG personnel feel they are helping the vendor and good-will of the CG by trying to resolve invoice errors telephonically while holding the invoices. If the vendor does not respond within the initial 15 days allowed to return the invoice to the vendor for correction, then the late payment clock has started and the CG is still holding the defective invoice. The business community has an obligation to provide a proper invoice in accordance with

the PPA. Even if invoice corrections are received from the vendor telephonically, there is no supporting documentation to preclude a vendor from denying the change and demanding interest, if appropriate, at some future date. Although there may be instances when the personal approach may be necessary to educate new vendors or improve working relationships with other vendors, as a general practice it should be avoided. Failure to properly notify the vendor, and properly document the notification of a defective invoice within fifteen days after receipt, was the fourth leading cause of interest penalties.

5. Delay in Receiving Documents

The delay in the paying office receiving approved invoices, and purchase orders/contracts, were the fifth and sixth leading causes for late payments, respectively.

With regards to the receipt of approved invoices, some vendors are sending invoices to the unit receiving the materials even though the purchase order specifies invoices are to be directed to the paying office. In this case the invoice should be forwarded to the paying office, where it will be date stamped for commencement of the 15 day review period.

Some payment offices have reportedly established a policy that vendor invoices be sent to the ordering unit rather than directly to the payment office. The unit is

doing the review for defective invoices, and then is matching the invoice, receiving report, and purchase order. The matched documents package is then forwarded to the payment office where it is date stamped, reviewed, and processed for payment. Unless the unit does the date stamping, such a practice could be considered in violation of OMB Circular No. A-125.

A-125 requires the inclusion of the "...title, phone number and complete mailing address of the designated paying office..." in all contracts. A designated payment office is defined as "...the place named in the contract for forwarding of invoices for payment, or in certain instances for approval" [Ref. 2: p. 3]. Since the unit is not able to pay these invoices, then the argument shifts to whether or not the unit is necessarily being utilized "for approval" of the invoices.

Although review of the invoices and the matching process should be easier at the unit level because of their familiarity with what has been ordered, this should not be construed as approval for payment purposes. The ACO still has the responsibility to audit (review) for accuracy and validity 100% of the invoices larger than or equal to $750. So, for these invoices no approval can be implied at the unit level. For invoices less than $750 one would be equally hard pressed to contend approval at the unit level.

The only common instance where approval might legally occur beyond the payment office is for construction type contracts.

The other unfavorable aspect of having invoices sent to the unit for review and matching, is it duplicates the review process and shifts an inordinate amount of work from the payment office to the unit. Unit staffing levels do not take this workload into consideration, and they are therefore less able to efficiently process this workload than the payment office.

In Districts where the receipt of invoices by the ordering unit is a policy, lower interest penalties can certainly be expected. However, such a practice is contrary to the implementing regulations which all payment offices are responsible to comply with.

6. Discounts

Discounts taken in error were the seventh major cause for interest penalties. Such discounts, commonly known as unearned discounts, occur when the discount is taken after the discount period has expired. It is for this reason and the fact discount offers rarely brought about faster payment, that many vendors simply stopped offering them.

The other possible reason for unintentionally taking an unearned discount is to improperly anticipate the days

delay between sending the schedule for payment to the Regional Disbursement Office (RDO), and the date the checks are actually cut. This delay period is normally well established and easily anticipated however.

Another aspect of discounts is the miscalculation of whether or not they are advantageous to the government. While such miscalculations will not lead to interest penalties, there is a cost to the Treasury in taking a discount when it was not advantageous to do so. There is a cost to both the Coast Guard and Treasury in having missed a discount advantageous to the government.

In manual systems, discounts are easily miscalculated in both amount and date, thereby resulting in possible interest penalties. If improper computing of the discount period, amount, or whether the discount offered is advantageous to the government, then an automated system can virtually eliminate such problems.

7. <u>Computer Systems</u>

The eighth and final reason reported as a major cause of interest penalties was computer system problems. Personnel shortages were amplified during the changeover period from the manual to automated system. Simultaneous running of a new computer invoice payment system alongside the manual system was as short a period as possible. As a result, the transition was not as smooth as desired, and

exhaustive testing and training were not possible. On the job training of personnel, in an automated system, was necessary due to there being personnel shortages and six day work weeks, with work days normally in excess of eight hours in duration. This changeover occurred in the third quarter of FY83 at the 8th District payment office, and resulted in invoice processing problems through the remainder of the fiscal year.

Unexpected major power and/or computer failures without adequate manual backup systems caused the immediate problem of shifting over to a manual system, then returning to the automated system when repaired, and afterwards trying to make up for lost time.

In regards to limiting interest penalties, automation offers the automatic warehousing and scheduling of invoices for payment, accurate calculation of due dates and discounts, field edits to protect against input errors or fraud, and a multitude of performance reports for management and internal control purposes. An example of such attributes is given in the review of the 8th District in Chapter V.

E. STATISTICAL ANALYSIS OF FY83 INTEREST PENALTIES DATA

Interest penalties alone indicate the magnitude of the problems in commercial invoice processing, but do not provide insights into the causes. Statistical analysis indicates what some of the possible causes are or are not.

1. Binary Sample Data Correlations

For instance, the correlation coefficient between the total dollar amount subject to the PPA and the dollar amount of interest penalties was an insignificant -.07. This implies that if the amount of the CG budget subject to the PPA increases, virtually no change in the amount of interest penalties should be expected. However, with an increased budget, a greater number of invoices can be anticipated.

The correlation between the number of interest penalties and number of invoices indicates an insignificant positive relationship at .25.

The relationship between the number of personnel authorized at a payment center for accounts payable, and the number of invoices processed, resulted in a strong positive correlation of .78. Because personnel are not perfectly correlated to the number of invoices processed at each payment center, an increase in interest penalties can be expected with an increase in the number of invoices.

The dollar amount of interest penalties and dollar amount of early payments had a correlation of .66, indicating influential factors were common to both interest penalties and early payments within a payment office. As interest penalties increased so too did early payments. This points to internal control problems at the payment office, but does not amplify what the specific problems are.

2. Multiple Regression Analysis

Since the number of interest penalties was assumed to be most dependent upon the number of personnel and number of invoices at each payment office, a multiple regression was performed. In this manner the combined, or simultaneous, effect of these two factors upon interest penalties was investigated. The resulting regression equation, at a 90% confidence level, was: number of interest penalties = 809 - (250 x # of personnel) + (.04 x # of invoices per year), with a sample multiple correlation of .326, and a coefficient of determination of .106.

Interpretation of this equation indicates that for each additional person assigned to accounts payable, the number of interest penalties would be reduced by 250. Whereas, 25 additional invoices would result in one additional interest penalty. This would mean the average interest penalty would be $8.24, and the addition of one person to accounts payable would decrease interest penalties by $2060.

3. Summary

While the binary correlations indicate the most influential relationships on interest penalty payments, and suggest areas requiring further investigation and improvements, they do not take into account their simultaneous influence.

As seen in the statistical analysis of early payment data, the coefficient of determination (the sample multiple correlation squared) for the multiple regression is very low. This is normally the result of the influences of other factors (regressors) not considered in the multiple regression, and errors in the data. The variable coefficients of this regression equation do provide some assistance, however, in quantifying the affects of additional invoices and personnel.

V. COAST GUARD DISTRICT 8

A. DISCUSSION

To gain a better understanding of the problems associated with implementation of the PPA and OMB Circular No. A-125 requirements, two CG payment centers will be individually examined. This examination of the two districts visited depicts problems common to other CG payment offices. A review of these problems will emphasize the level of compliance with the PPA and A-125, and the degree of accuracy with which such compliance is reported.

The two districts selected for this study were the 8th and 12th. One reason for selecting these districts was because of the potential for comparison of an automated payment office to a manual payment office. This comparison became even more desirable when their reported interest penalty and early payment figures were considered. The 8th District, with an automated payment system, reported much larger interest penalties and early payments, in proportion to resources, than the manual payment system at the 12th District.

B. ACCOUNTING BRANCH

1. General Description

The 8th District Accounting Branch is the responsible payment office for all district assigned unit

procurements made by shore and afloat units dispersed across the states of New Mexico, Texas, Louisiana, Mississippi, Alabama, and the western portion of Florida. The payment principles and objectives under which the district operates are established by Commandant, Accounting Division (G-FAC), as previously described in Chapter II.

2. Organization

Organizational structure is an important influence in the design and use of an internal control system. The 8th District Accounting Branch is organized along functional lines, with voucher and accounting sections. The voucher section, which processes commercial invoices subject to the PPA and is therefore the section of interest here, is subdivided into two subsections. The first subsection primarily processes contracts, Government Bills of Lading (GBL's), Government Transportation Requests (GTR's), interagency billings, utilities, and credit cards. Subsection 2 processes commercial vendor invoices, purchase orders, Small Purchase SF44's, and receiving reports. Centralized functions of this nature promote efficiency because personnel specialize in handling documents with similar processing requirements.

With automation, increased consolidation of duties can normally be expected, thereby leading to a more highly centralized organization. However, implementation of the

PPA counteracted this tendency at the 8th District. For proper control and compliance with the PPA, a greater degree of segregating duties became necessary. More thorough invoice verification requirements and the increased number of documents also counteracted the effect of automation on the consolidation of duties.

3. Documents

The flowchart of commercial invoice processing, on the following page, depicts the major tasks, organization, and segregation of duties.

All incoming mail is date stamped, sorted, and forwarded to appropriate personnel in the Accounting Branch. Purchase orders are forwarded to a GS-5 in Subsection 2 for object coding and fund obligation. Next the P.O. is forwarded to a GS-4 for assigning a voucher examiner. This assignment is normally made on the basiss of the P.O. number in order for voucher examiners to gain familiarity with individual units. (Some large payment centers assign work alphabetically, by vendor name to allow voucher examiners to become familiar with their assigned vendors.) Assignments may be made to equitably assign the workload due to personnel shortages or the temporary absence of the regular voucher examiner for the purchase orders of certain units. The computer may be queried to provide the number of invoices being processed by any one voucher examiner.

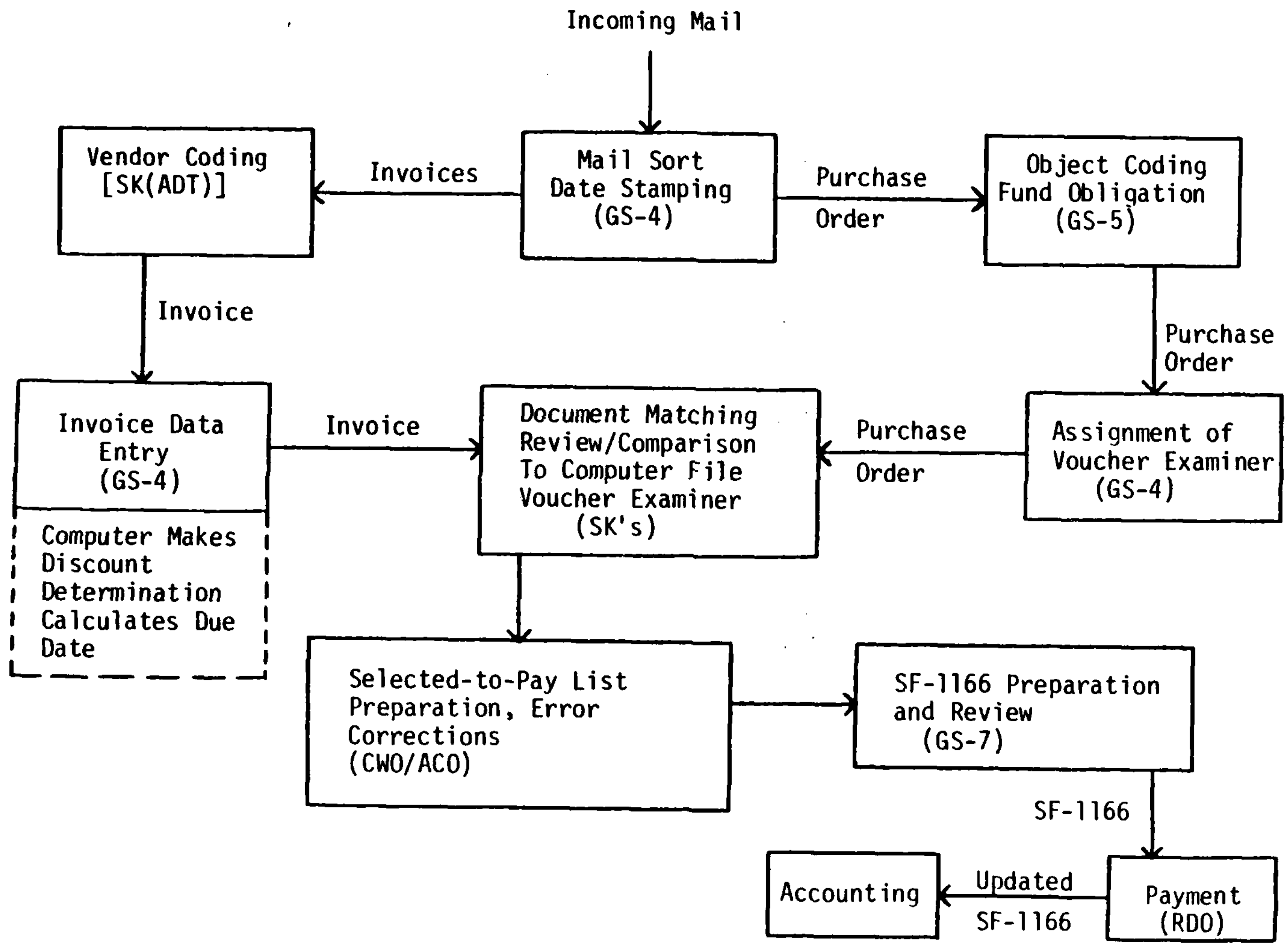

Figure 5.1. 8th District Invoice Payment Process

Commercial invoices are vendor coded after date stamping. This is a randomly assigned six digit number to identify the vendor computer file. In the case of an invoice from a new vendor, the Administrative Contracting Officer (ACO) assigns the number. (Based upon the experiences of the 8th District, it was suggested that future automations of accounts payable use the vendor tax identification number for this purpose.)

The invoice data is then entered into the computer. Data input is the most important phase in the processing of invoices. While computer field edits can protect against non-sensical input errors, "reasonable errors" may be processed and result in output/payment errors.

Separate processing of purchase orders and invoces up to this point is an important internal control feature. Unauthorized alterations of the invoice, purchase order, and receiving report would be difficult, and once these documents are matched, both the purchase order and invoice data have already been entered into the computer. Changing the computer entered data to effect fraudulent payments is difficult because individuals in the processing cycle below the ACO are locked out by the computer password system. Inconsistencies between documents and the computer data noted by the voucher examiner are brought to the attention of the ACO for correction.

The ACO then generates a computer error listing of all invoices due for payment. An error listing provides the schedule number, voucher examiner, and document type.

Upon resolution of the error listing, a Selected To Pay listing is run. This is reviewed by the GS-7 and used as input for the Invoice Payment program. This program produces an SF-1166 on computer tape, updates all supporting files with the payment information, and provides a listing of invoices rejected for payment and invoices "force-paid". (Invoices lacking all the normally required data to be processed for payment may be "force-paid" by the supervisor's overriding of the program edits.)

The SF-1166 is then sent to the appropriate Regional Disbursement Office (RDO) for checks to be prepared and mailed to vendors. The payment data is updated on the SF-1166 tape and returned to the 8th District Accounting Branch. The tape is run once again to update and verify payment information in supporting files.

There are many more internal control checks and balances provided by the computer and supervisory use of the reports made possible by the computer. These controls make unintentional and fraudulent errors very difficult to make, provided the program design and management are correct.

C. INTERNAL CONTROL PROBLEMS

1. Discussion

The magnitude of early payments and interest penalties for the 8th District (Tables 2 and 4, Appendix C) are particularly unrepresentative of the relative degree of internal control problems in comparison to manual invoice processing districts. Since the 8th District also had a manual system for three quarters of FY83, then the annual interest penalty and early payment figure should have been subjected to 75% of the same downward adjustments, and interest penalties the same reviews afforded other payment offices. This would have allowed for a more meaningful and accurate comparison. Such adjustments and reviews were not afforded the 8th District's data according to the records reviewed in this study.

Secondly, interest penalty and early payment figures in general do not indicate the degree of compliance with PPA and A-125 requirements. Discounts may be improperly computed or taken, interest penalties not automatically paid, and a multitude of other possibilities.

The 8th District's first priority in automating invoice processing was to be in total compliance with all governing regulations. This has been accomplished for programmable tasks (such as the computation of discounts, due dates, and interest penalties). However, since all

invoice processing procedures are not programmable, interest penalties will still occur due to personnel errors and delays. Early payments should be drastically reduced or eliminated. The computer can prevent early invoice payment, as will an equally accurate manual invoice or SF-1166 schedule warehousing system.

The 8th District can now focus on resolving those problems causing interest penalties which will be common to both automated and manual systems alike.

2. <u>Personnel</u>

a. Turnover and Shortages

Although personnel are the most important resource, personnel administration procedures are often counter-productive to accomplishing organizational goals and objectives. During FY83 a civilian hiring freeze and gaps in military billets due to transfers/discharges created serious shortages in the 8th District Accounting Branch. As of January 1984 all but two of the civilian positions had been filled. Due to the reduction of interest penalties and early payment costs estimated by the multiple regression models, the actual cost to the CG and Treasury of filling these positions is significantly reduced.

The other important civilian personnel issue noted is that the predominant GS level in accounting is conducive to a higher than desired turnover rate. At the

GS-4 and 5 levels, and given the repetitive nature of the work, civilian personnel are incentivized to advance or be hired away by other agencies able to offer more pay and higher GS levels. Due to the limited size of the Accounting Branch, internal advancement is very unlikely.

The more frequent turnover of military personnel at the district and units destroys the advantages of continuity and to a lesser degree accountability for performance. Storekeepers without previous experience in the processing of invoices must be trained, and those from other districts must learn the peculiarities of a new district. In the 8th District with the preponderence of storekeepers, primarily as voucher examiners and at the unit level, the turnover problem is especially acute.

b. Overtime/Active Duty Training (ADT)

Another factor found at the 8th District is the amount of overtime required in the Accounting Branch. The average work week for accounts payable is ten hours per day, six days per week.

Overtime costs for the 8th District Accounting Branch ballooned in FY83 to $99,605 from FY82 overtime costs of $66,847. This represents 49% of all the district office overtime payments for FY83, while the FY82 figure was 43%. The majority of this increase is attributable to the combined effect of implementing PPA requirements, personnel

shortages, automation of the invoice payment systems, and personnel performance.

Additional military overtime and personnel assigned above billet authorization levels are also added costs of the PPA which have not been captured by PPA reports. The 8th District's Accounting Branch has required one storekeeper on ADT for over one year due to billet vacancies and added requirements of the PPA. The data entry position on the invoice processing flowchart is filled by a GS-4 not even belonging to the Accounting Branch. All of the storekeepers in accounts payable have also been subject to the 10 hours per day, six days per week average work week.

As expected, overtime costs are decreasing in FY84. During the first two months of FY84, approximately $16,000 in overtime is attributable to the Accounting Branch. This includes the closeout of FY83 records, and is normally the period during which a greater percentage of overtime costs are incurred.

The point in discussing overtime costs is to show the magnitude of costs partially attributable to the PPA that have been ignored in PPA reporting requirements to OMB by all Federal agencies. The second reason is to show that the filling of authorized personnel positions assigned to the Accounting Branch will reduce these overtime costs

as well as the amount of interest penalties and costs associated with early payments, as discussed in Chapters III and IV.

c. Performance Evaluation

With the error listing and number of invoices processed per voucher examiner at the 8th District, there now exists enough information with which to design processing standards and incentives to reduce overtime requirements for efficient performers. For military personnel, the enlisted evaluation system has had a positive motivating influence, but more frequent evaluation through the use of highly visible standards is considered advisable.

In conjunction with such standards, the ACO should be responsible for their enforcement. In the 8th District, the ACO and voucher examiner positions are especially important to the timely and efficient processing of commercial invoices. It is at these positions where actions are initiated to correct or obtain all the documents necessary to process payments. Ineffective leadership on behalf of the ACO will culminate in interest penalties and early payments that are otherwise avoidable, and require overtime to complete the processing of payments.

3. Document Processing

a. Shipping Cost/Price Variances

As noted in Chapter IV, the failure of units to authorize and obligate funds on purchase orders to cover

shipping costs, causes delays in the payment process. In order to minimize this problem, the 8th District promulgated a district instruction giving authority to the district to unilaterally increase a unit's purchase order up to $100, to cover shipping charges and other valid increases. If the unit underestimated costs by more than $100, a modification of the purchase order by the issuing unit is necessary.

Although this practice exceeds the scope and $30 increase authorized in the Comptroller Manual Volume 1 for invoice errors, the action is in keeping with sound management implementation of procedures considered necessary to reduce interest penalties. A recommendation to adopt more liberal reasons and amounts for adjustments to purchase orders is made in Chapter VII.

b. Non/Late Receipt of Documents

In the 8th District, this problem is most frequently associated with receiving reports, although units also occasionally fail to prepare or forward purchase orders.

It was suggested that the highly decentralized procurement authority creates more document receipt problems for the centralized payment office, although decentralized purchasing authority is seemingly desirable from an operational aspect. Personnel unfamiliar with the processing requirement of these documents are frequently

authorized to make purchases, and the timely forwarding and proper completion of these documents for payment does not occur unless the responsible unit has adequate controls in effect. Should resulting interest penalties be unacceptably high or frequent, the responsible units should have their procurement authority restricted if other remedies are ineffective.

The turnover of responsible personnel, their training level, and conflicting unit priorities are also causes of document receipt problems.

c. Error Corrections

The most common errors on other vendor invoices are failing to reference a purchase order, and differences in item descriptions and unit prices. These invoices should automatically be returned by letter and the 8th District's computer has a form letter on file for this purpose. However, the person responsible for returning defective invoices frequently attempts to resolve errors telephonically. The advantages and disadvantages of this error correction method were discussed in Chapter IV.

Vendor invoices for commissary purchases were continually fraught with errors. Vendor failure to respond to the PPA requirements for a proper invoice required the 8th District to abandon the DD-1155 Blanket Purchase Agreement for such purchases, in November 1982. The SF-44

was substituted, vendors were no longer required to provide monthly statements, and units were required to reduce the number of deliveries from the vendor. The obvious result is fewer documents and fewer errors to correct, but a larger inventory is required as a result.

d. Fast Pay/Imprest Funds/SF-44's

Any reduction to the number of documents necessary to process payment can reduce the number of problems and thereby reduce the amount of interest penalties. The 8th District has liberalized the procurement authority of units by increasing the uses or dollar limitations for uses of Fast Pay, SF-44's, and Imprest Funds procedures.

This does not necessarily conflict with the earlier discussion of problems caused by decentralized procurement authority, however, expanded use of Imprest Funds carries an added cost to the Treasury like early payments.

D. SUMMARY

The 8th District FY83 interest penalties and early payments seem to indicate major problems. However, the early payments were not adjusted downwards by (G-FAC) like those of other districts, and the number of interest penalties for the 8th District should be higher than all the other districts given the resources to process payments and

the number and type of invoices/documents requiring processing. This is especially true in light of the personnel shortages throughout FY83 and continuing into FY84.

The important issue is that the 8th District is consistently complying with all the technical requirements of the PPA with proper calculations regarding discounts, due dates, and interest penalties. Although such compliance may be considered intuitively obvious by the reader, consistent compliance was found not to be the case in the 12th District.

Also, there is an adequate system of internal controls with which to deal with the problems discussed above. A favorable change can be expected for FY84 as a result, with the most significant reduction expected in early payments and overtime expenses in the Accounting Branch.

VI. COAST GUARD DISTRICT 12

A. DISCUSSION

The 12th District was selected for study because it had a manual invoice processing system during all of FY83, and the reported amounts of interest penalties and early payments indicated excellent invoice processing.

B. ACCOUNTING BRANCH

1. General Description

The 12th District Accounting Branch is the responsible payment office for all District assigned unit procurements made by shore and afloat units in Northern California, Nevada, and Utah. As with the 8th District, the payment principles and objectives of the 12th District are prescribed by COMMANDANT (G-FAC) and are discussed in Chapter II.

2. Organization

The 12th District Accounting Branch is organized along functional lines similar to that of the 8th District. The Accounting Branch has a voucher section which possesses commercial invoices, purchase orders, SF-44's, and receiving reports. Contracts are matched with invoices and completion/receiving reports in the Contracting Branch, then forwarded to Accounting for review and scheduling for payment.

3. Document Processing

The flowchart of commercial invoice processing on the following page, depicts the major tasks, organization, and segregation of duties of interest to this research.

All incoming mail is date stamped, sorted, and forwarded to appropriate personnel within the Accounting Branch, with the exception of invoices lacking reference to a purchase order number. Since the matching of these invoices to purchase orders and receiving reports would be very time consuming, and since vendors are required by the PPA to provide such a reference, they are automatically returned to the vendor for correction. Upon correction and return, they are then date stamped and processed.

Purchase orders are forwarded to the accounting section for object coding and fund obligation. Upon completion, the purchase orders are returned to the appropriate voucher examiner.

Invoices and receiving reports are forwarded to the appropriate voucher examiner for matching with the purchase orders. This assignment is made by the fiscal year in which the purchase was made, with documents from the previous fiscal year assigned to one voucher examiner, and current fiscal year documents assigned to the second voucher examiner.

The voucher examiner initially matches the invoice, purchase order, and receiving report. The documents are

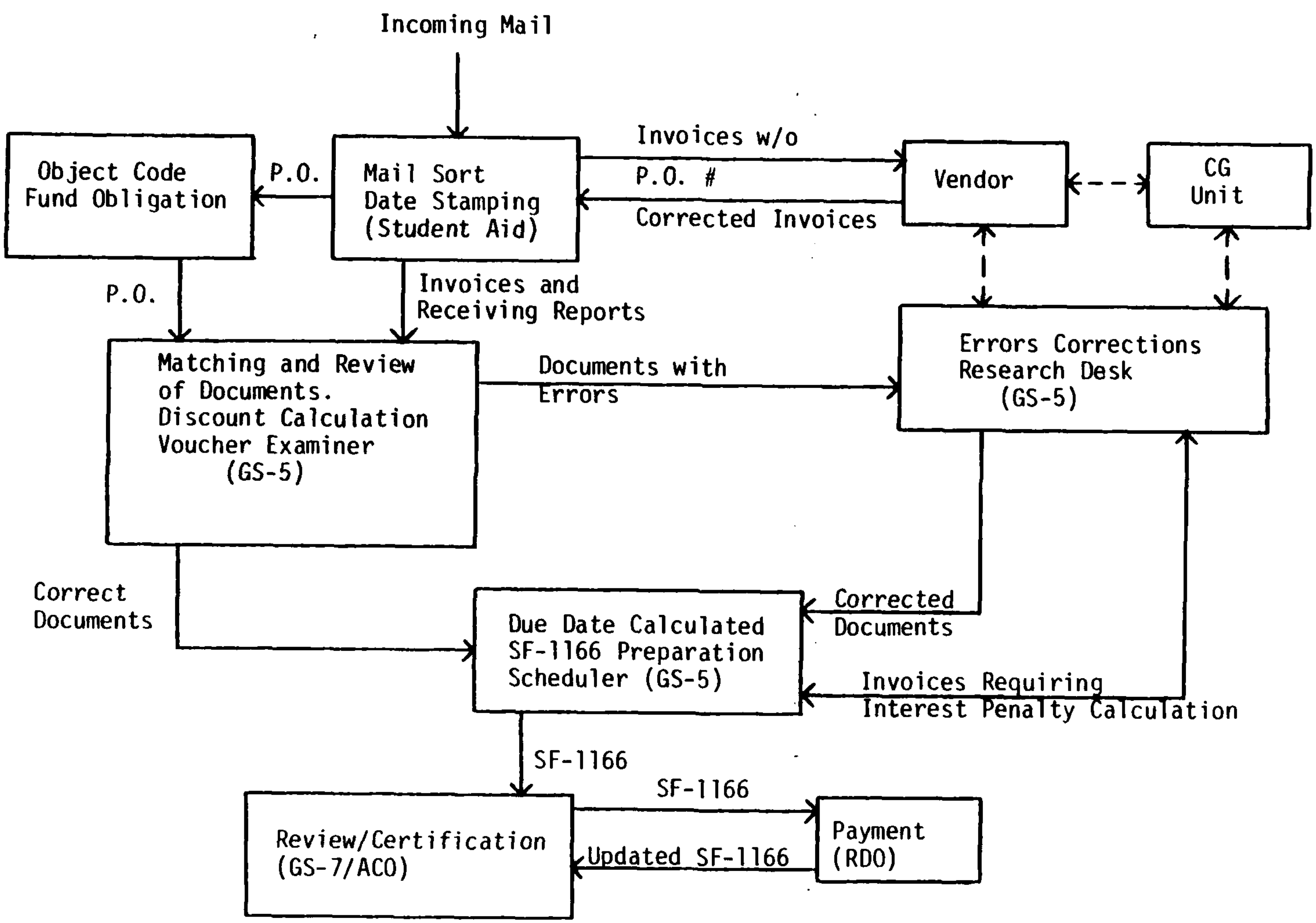

Figure 6.1. 12th District Invoice Payment Process

reviewed for matching part numbers, prices, quantity, descriptions, extensions, and shipping charges. If all the required documents are error free, the voucher examiner forwards the complete package to the scheduler. For those invoices offering discounts, the amount of the discount is calculated by the voucher examiner (but no calculation is made to determine if the discount offered is advantageous to the government) before forwarding to the scheduler. Documents with errors are forwarded to the research desk, where the errors are resolved.

Once the scheduler receives an invoice and supporting documents for payment, he calculates the due date or discount date. If still within the discount period and it is not too late to schedule the payment within that period, then the discount is taken and the invoice scheduled for payment. Although this procedure appears to be correct, it was discovered the discount period stated on the invoice is not being adjusted for the latter of the date the goods or invoice is received. This is a contributory factor to the missing of otherwise earned discounts.

If beyond the discount period, or no discount is offered, then the invoice is physically warehoused according to its due date and then scheduled for payment at that time. The warehousing of invoices was commenced in February 1984.

For partial payments, once the partial payment has been scheduled the documents are returned to the voucher

examiner, where they are held awaiting receipt of another invoice for the balance.

If upon calculating the due date the scheduler notes that payment will be late, the invoice is given to the research desk where the interest penalty amount is calculated and recorded. The scheduler then schedules the invoice for payment, with the interest penalty normally being charged to the 4301 account. The interest penalty is sometimes incorrectly included in the purchase order when scheduled for payment, rather than the 4301 account.

The scheduler completes the SF-1166 and forwards it for review and certification for payment. The SF-1166 is then forwarded to the Regional Disbursement Office (RDO). When the RDO has completed the payments, an updated SF-1166 is returned to the Accounting Branch, with the payment date and amount for each scheduled payment. The completed SF-1166 is simply filed for future reference if payment inquiries are received. There is no automatic verification of amounts paid as is done in the 8th District.

C. INTERNAL CONTROL PROBLEMS

1. Discussion

The FY83 interest penalties and early payments reported by the 12th District understate the degree of internal control problems present. As noted in the previous chapter, these figures do not indicate the degree of

compliance with PPA and A-125 requirements unless the requirements have been properly interpreted and operationalized so that discounts, due dates, and interest penalties are properly computed. In the 12th District, these calculations are not accurate nor are they consistently applied.

A comparison of the research desk records for interest penalties and the 4301 account indicated the underreporting of interest penalties by approximately $5,000 for FY83. Discrepancies between the two sets of records for the first five months of FY84 were in the opposite direction with the research desk records showing only half of the amount in the 4301 account. Although the trend of interest penalty payments was shown to be down, there is no degree of accuracy or consistency in their recording and therefore reporting. The major contributing factors to this and other problems are discussed below.

2. Personnel

a. Turnover and Shortages

The 12th District had a significant turnover problem with personnel turnover due to the physical relocation of the District offices from San Francisco to Alameda near the end of FY83. At the GS-4 and 5 levels, few could afford the added costs of commuting to the new office location, especially when other federal agencies were available to work for in San Francisco.

The GS level in the Accounting Branch in the 12th District is very similar to that of the 8th District, and is also conducive to a higher than desired turnover rate. Due to the repetitiveness of accounting/payment functions, and the pay at the GS-4 and 5 levels, civilian personnel are incentivized to advance or be hired away. Due to the limited size of the 12th District Accounting Branch, there is little hope of internal advancement. However, due to the socio-economics of Alameda, these tendencies contributing to high personnel turnover rates are minimal in comparison to the 8th District.

Another relative advantage found in the 12th District is the lack of military personnel and the problems associated with their frequent turnover.

b. Overtime/ADT

While the dollar amount of overtime in the Accounting Branch for FY83 was only $4,169, very little of it was attributable to the PPA. There was, however, some overtime which was not charged and was directly attributable to compliance with the PPA. In FY84 this overtime is being charged and for the first four months of FY84 overtime costs equaled $2,538.

Although the overtime costs are not material in amount, it was noted that with regards to the PPA much of the overtime necessary was at the supervisory level, including the Branch Chief.

The mail sorting position filled by a high school student aid works well due to the competency of the students and the relatively light workloads.

In short, overtime costs for the 12th District are relatively small, but a percentage is still attributable to the PPA, and is not captured in PPA reports.

c. Performance Evaluation

Although the commercial invoice payment section is very small, quantitative performance evaluation is very difficult with a manual processing system. The office workload precludes the generation of specific reports for management purposes, except for those which are required for external reporting and happen to coincide with the performance evaluation of individuals. The early payments report falls into this category, since virtually all early payments can be attributable to the scheduler.

Also, in a manual system more performance measures would be necessary to protect against errors in calculating due dates, interest penalties, and discounts--errors which are not found in an automated system such as the 8th District's.

Supervisory personnel have been burdened with day to day problem solving, and therefore have had little opportunity to develop the internal controls necessary to preclude many of these problems. In fact, they have been unable to even learn of some problems for this reason.

Installation of an automated system in the 12th District during FY84 should include the generation of reports for management and personnel performance evaluations similar to those of the 8th District. Once implemented, the development and use of invoice processing standards peculiar to the 12th District are encouraged.

3. Document Processing

a. Shipping Costs/Price Variances

Units in the 12th District, as in the 8th, often fail to obligate sufficient funds on purchase orders to cover shipping costs. Due to the delays caused in seeking additional obligation authority from the unit, the 12th District unilaterally increases the unit's purchase order to cover warranted costs. The unit is notified of these changes by letter from the payment office. This procedure is also followed for upward adjustments due to price changes.

Although such adjustments can and do exceed the scope and $30 increase authorized in the Comptroller Manual Volume 1, it is necessary from a practical viewpoint to avoid interest penalties.

b. Non/Late Receipt of Documents

Verbal purchases between a unit and vendor often cause an invoice to arrive at the payment office without reference to a purchase order number, and the ordering unit

frequently fails to prepare the purchase order or forward it. Such invoices are returned to the vendor for inclusion of a purchase order number, or lacking this number, any other amplifying information regarding the purchase.

If the vendor was not provided a purchase order number, the Accounting Branch must then query the supposed ordering unit for a purchase order. Although verbal orders are operationally expedient for the unit, and since the vendor is unwilling to forego a sale for the lack of a purchase order, such procedures often result in interest penalties and require an inordinate amount of manhours to resolve after the fact.

The receiving report is frequently a source of problems, also. The partial receipt of materials or services is not documented, yet the vendor may initiate an invoice for partial payment. The total omission of a receiving report is all too common.

As in the 8th District, document receipt problems in the 12th District are frequently the result of unit personnel turnover, their level of training, and conflicting unit priorities.

c. Error Corrections

The 12th District receives between five and ten invoices a day that do not reference a purchase order number. These are routinely returned by letter to the vendor for correction.

Invoice and purchase order errors in item descriptions, quantities or extensions are frequently noted by the voucher examiner. These are forwarded by form letter to the unit for resolution. If the unit finds it to be an invoice error, then the vendor is requested to submit a corrected invoice. If the error was the unit's purchase order, then corrections are made and all documents returned to the payment office. Interest penalties caused by unit errors are charged against the unit's funds.

The only other problem noted with error correction procedures was the tendency of the voucher examiner to prevent partial payment of an invoice because of a mismatch in the documents affecting perhaps only one line item. While partial payments are only authorized if provided for in the contract or purchase order, if the error is on behalf of the Coast Guard and a late payment occurs, then the interest penalty is computed on the full invoice amount rather than the single item originally in error. To reduce the potential incurrence of unnecessarily inflated interest penalties, partial payment processing is desirable. However, in a manual processing system this would increase the possibility of a duplicate payment. With automation, partial payments are possible without increasing the risk of duplicate payments.

d. Other Errors

During FY83, discount dates were being improperly computed as previously discussed, discount terms were not being checked to see if they were monetarily advantageous to the government; and interest penalties were frequently included in the purchase order and were not captured in the 4301 account.

Not only do such errors distort the reported figures for interest penalties and early payments, but they are in direct violation of the PPA and A-125 requirements. Until the problems underlying these errors are solved, performance measures or reports cannot be relied upon. Automation should solve these errors, but their immediate resolution is considered vital to the integrity of the payment office.

D. SUMMARY

The 12th District FY83 interest penalties and early payments at first glance seem to indicate relatively minor problems in comparison with other payment offices. However, due to the degree of non-compliance with the PPA and A-125, these reported figures are not accurate nor are they representative of the serious problems that existed.

With automation and the existing organization of the commercial invoice payment section, the major internal problems of the payment office will be resolved. This

statement assumes the automated system will have adequate controls and field edits similar to those found to be necessary in the 8th District. Without them, the 12th District's problems may continue because the same personnel making the errors in the manual system will be the terminal operators in the automated system.

The 12th District can expect fewer early payments for FY84 due to the physical warehousing of invoices for payment. However, until the basic problems of calculating discounts, due dates, and recording of interest penalties in the 4301 account, can be resolved, errors in early payment and interest penalty figures will still exist.

The reduction of interest penalties will only occur with streamlined document error correction procedures, and increased unit cooperation in preparing and forwarding purchase orders and receiving reports. The FY84 report of interest penalties will contain errors similar to those discussed for FY83, but smaller in magnitude due to correction of the causes during FY84.

Increased overtime costs can be expected in FY84 during the transition to an automated system, and the accurate recording of actual overtime hours.

Early payments should be dramatically reduced during FY84, with the implementation of invoice warehousing in February 1984.

VII. CONCLUSIONS AND RECOMMENDATIONS

A. CONCLUSIONS

Coast Guard early payments during FY83 cost the Federal Government much more than interest penalties. In the rush to prevent late payments and interest penalties, early payments were the norm with first-in first-out manual invoice processing procedures. Automated or manual warehousing of invoices, along with other improvements, have since been implemented and early payments should be the exception rather than the rule by FY85.

Interest penalties on late payments, however, can be expected to decline much more slowly due to the nature of the causes discussed in this study. Decreased personnel turnover, increased training and supervision, simplification and a reduction in the number of documents required to process payments, and automation of programmable invoice processing tasks are important contributing factors. Changes to these factors are a long term process, but they must be addressed at all levels to achieve a minimum number and amount of interest penalties.

In light of the total number of invoices processed and the total dollar volume, early payments and interest penalties are not a significant problem with the Coast

Guard; however, the potential exists to reduce these costs far below current levels.

Some specific conclusions reached are:

1. the early payment and interest penalty figures reported to OMB do not necessarily reflect the degree of compliance with the PPA;

2. early payment costs and interest penalties do not reflect the total cost of compliance with the PPA;

3. automation similar to that of the 8th District is considered essential to the consistent application of PPA requirements, accurate reporting, and the development of invoice processing standards;

4. partial payments can reduce the number and amount of interest penalties;

5. the $30 increase of purchase orders authorized by the Comptroller Manual Vol. 1, for invoice errors, is inadequate in amount and scope;

6. personnel turnover rates are detrimental to timely invoice processing;

7. CG units appear to be having problems processing the added burden of documents required for PPA compliance;

8. Accounting Branch supervisors have insufficient time or resources available to study and resolve payment office problems;

9. the statistical sampling procedures used in FY83 were improper; and

10. the narrative reasons for interest penalties and early payments given by payment offices, in their annual PPA reports, are too subjective for meaningful analysis and efficient corrective actions.

B. RECOMMENDATIONS

1. Automate payment offices to insure invoice warehousing, accurate reporting of interest penalties and

early payments, proper calculations of discounts, due dates, and interest penalties, and provide for periodic management reports of personnel performance.

2. Change the Comptroller Manual Vol. 1 to authorize payment office adjustments to unit purchase orders of any amount for any justifiable reason. This is to preclude interest penalties while awaiting units to obligate additional funds for shipping charges or other justifiable increases to invoices, and eliminate the added paperwork involved.

3. Adopt reason codes (Appendix D) for interest penalties to improve upon PPA reporting and the management of contributing factors.

4. Expand the use of Fast Pay and SF-44's to streamline the payment process. This action will reduce the number of documents necessary to process payments, and will reduce the number of error corrections.

5. Reduce turnover rates of personnel directly involved in the processing of documents required for payment of commercial invoices, and provide them with additional training or supervision.

6. Utilize Area Inspections and DOT Inspector General's audits to determine internal control problems at payment offices which contribute to early and late payments.

7. Improve statistical sampling techniques for the reporting of early payments.

8. Develop multiple regression models from FY84 interest penalty and early payment data for the evaluation of payment offices. Also, provide target figures of interest penalties and early payments to each payment office based upon these models and the anticipated FY84 funding levels associated with each.

9. Encourage the inclusion of provisions for partial payments in contracts and purchase orders to reduce the potential amount of interest penalties, provided adequate controls are in existence at the payment office to prevent duplicate payments.

APPENDIX A

PROMPT PAYMENT ACT (PL97-177)

Public Law 97-177
97th Congress

An Act

To require the Federal Government to pay interest on overdue payments, and for other purposes. May 21, 1982 [S 1131]

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, Prompt Payment Act.

SHORT TITLE

SECTION 1. This Act may be cited as the "Prompt Payment Act". 31 USC 1801 note.

INTEREST PENALTIES ON LATE PAYMENTS

SEC. 2. (a)(1) In accordance with regulations prescribed by the Director of the Office of Management and Budget, each Federal agency which acquires property or services from a business concern but which does not make payment for each such complete delivered item of property or service by the required payment date shall pay an interest penalty to such business concern in accordance with this section on the amount of the payment which is due. 31 USC 1801.

(2) Such regulations—

(A) shall specify that the required payment date shall be—

(i) the date on which payment is due under the terms of the contract for the provision of such property or service; or

(ii) thirty days after receipt of a proper invoice for the amount of the payment due, if a specific date on which payment is due is not established by contract;

(B)(i) in the case of any acquisition of meat or of a meat food product, as defined in section 2(a)(3) of the Packers and Stockyards Act, 1921 (7 U.S.C. 182(3)), shall specify a required payment date which is not later than seven days after the date of delivery of such meat or meat food product; and

(ii) in the case of any acquisition of a perishable agricultural commodity, as defined in section 1(4) of the Perishable Agricultural Commodities Act, 1930 (7 U.S.C. 499a(4)), shall specify a required payment date consistent with requirements imposed pursuant to such Act;

(C) shall specify separate required payment dates for contracts under which property or services are provided in a series of partial executions or deliveries, to the extent that such contract provides for separate payment for such partial execution or delivery; and

(D) shall require that, within fifteen days after the date on which any invoice is received, Federal agencies notify the business concern of any defect or impropriety in such invoice which would prevent the running of the time period specified in subparagraph (A)(ii).

(b)(1) Interest penalties on amounts due to a business concern under this Act shall be paid to the business concern for the period

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beginning on the day after the required payment date and ending on the date on which payment of the amount due is made, except that no interest penalty shall be paid if payment for the complete delivered item of property or service concerned is made on or before (A) the third day after the required payment date, in the case of meat or a meat food product described in subsection (a)(2)(B)(i); (B) the fifth day after the required payment date, in the case of an agricultural commodity described in subsection (a)(2)(B)(ii); or (C) the fifteenth day after the required payment date, in the case of any other item. Interest shall be computed at the rate determined by the Secretary of the Treasury for interest payments under section 12 of the Contract Disputes Act of 1978 (41 U.S.C. 611). The Secretary of the Treasury shall publish each such rate in the Federal Register.

Interest rate computation.

Publication in Federal Register.

Unpaid interest penalty.

(2) Any amount of an interest penalty which remains unpaid at the end of any thirty-day period shall be added to the principle amount of the debt and thereafter interest penalties shall accrue on such added amount.

(c) This section does not authorize the appropriation of additional funds for the payment of interest penalties required by this section. A Federal agency shall pay any interest penalties required by this section out of funds made available for the administration or operation of the program for which the penalty was incurred.

Interest penalty payments.

(d)(1) Any recipient of a grant from a Federal agency may provide in a contract for acquisition of property or services from a business concern for the payment of interest penalties on amounts overdue under such contract, except that—

(A) in no case shall an obligation to pay such interest penalties be construed to be an obligation of the United States, and

(B) any payment of such interest penalties shall not be made from funds provided to the grant recipient by a Federal agency, nor shall any non-Federal funds expended for such interest penalties be counted toward any matching requirement applicable to that grant.

(2) Such interest penalty payments shall be made under such terms and conditions as agreed to by the grant recipient and the business concern, consistent with the grant recipient's usual business practices and applicable State and local law.

LIMITATION ON DISCOUNT PAYMENTS

31 USC 1802.

SEC. 3. (a) If a business concern offers a Federal agency a discount from the amount otherwise due under a contract for property or services in exchange for payment within a specified period of time, the Federal agency may make payment in an amount equal to the discounted price only if payment is made within such specified period of time.

(b) Each agency which violates subsection (a) shall pay an interest penalty on any amount which remains unpaid in violation of such subsection. Such interest penalty shall accrue on such unpaid amount in accordance with the regulations prescribed pursuant to section 2, except that the required payment date with respect to such unpaid amount shall be the last day of the specified period of time described in subsection (a).

CLAIMS; RELATION TO OTHER LAW

SEC. 4. (a)(1) Claims for interest penalties which a Federal agency has failed to pay in accordance with the requirements of section 2 or 3 of this Act may be filed under section 6 of the Contract Disputes Act of 1978 (41 U.S.C. 605). 31 USC 1803

(2) Interest penalties under this Act shall not continue to accrue (A) after the filing of a claim for such penalties under the Contract Disputes Act of 1978, or (B) for more than one year. 41 USC 601 note

(3) Paragraph (2) shall not be construed to preclude the accrual of interest pursuant to section 12 of the Contract Disputes Act of 1978 (41 U.S.C. 611) after interest penalties have ceased accruing under this Act, and interest pursuant to such section may accrue on both any unpaid contract payment and on the unpaid interest penalty required by this Act.

(b) Except as provided in section 3 with respect to disputes concerning discounts, this Act shall not be construed to require interest penalties on payments which are not made by the required payment date by reason of a dispute between a Federal agency and a business concern over the amount of that payment or other allegations concerning compliance with a contract. Claims concerning any such dispute, and any interest which may be payable with respect to the period while the dispute is being resolved, shall be subject to the Contract Disputes Act of 1978.

CONGRESSIONAL OVERSIGHT

SEC. 5. (a) Each Federal agency shall file with the Director of the Office of Management and Budget a detailed report on any interest penalty payments made under this Act during the preceding fiscal year. Report, filing with OMB 31 USC 1804.

(b) Such report shall include the number, amounts, and frequency of interest penalty payments, and the reasons such payments were not avoided by prompt payment, and shall be delivered to the Director within sixty days after the conclusion of each fiscal year. Contents.

(c) The Director shall submit to the Committee on Governmental Affairs, the Committee on Appropriations, and the Committee on Small Business of the Senate and to the Committee on Government Operations, the Committee on Appropriations, and the Committee on Small Business of the House of Representatives within one hundred and twenty days after the conclusion of each fiscal year a report on Federal agency compliance with the requirements of this Act. Such report shall include a summary of the report submitted by each Federal agency under subsection (b) and an analysis of the progress made in reducing interest penalty payments by that agency from previous years. Federal agency compliance; submittal to congressional committees.

DEFINITIONS

SEC. 6. For the purposes of this Act— 31 USC 1805.

(1) the term "Federal agency" has the same meaning as the term "agency" in section 551(1) of title 5, United States Code, but also includes any entity (A) which is operated exclusively as an instrumentality of such an agency for the purpose of administering one or more programs of that agency, and (B)

which is so identified for this purpose by the head of such agency;

(2) the term "business concern" means any person engaged in a trade or business and nonprofit entities operating as contractors;

(3) an invoice shall be considered a "proper invoice" when it contains or is accompanied by such substantiating documentation (A) as the Director of the Office of Management and Budget may require by regulation, and (B) as the Federal agency involved may require by regulation or contract;

(4) an invoice shall be deemed to have been received by an agency on the later of—

(A) the date on which the agency's designated payment office or finance center actually receives a proper invoice; or

(B) the date on which such agency accepts the property or service concerned;

(5) a payment shall be considered made on the date on which a check for such payment is dated; and

(6) a contract for the rental of real or personal property is a contract for the acquisition of that property.

EFFECTIVE DATE

31 USC 1801 note.

SEC. 7. (a) This Act applies to the acquisition of property or services on or after the beginning of the first calendar quarter which begins more than ninety days after the date of enactment of this Act.

31 USC 1801 note.

(b) The provisions of this Act requiring the promulgation of regulations shall be effective upon enactment, and such regulations shall be promulgated not later than ninety days after the date of enactment of this Act.

31 USC 1806.

(c) The provisions of this Act shall apply to the Tennessee Valley Authority, but any regulations promulgated under the authority of this Act shall not be applicable to the Tennessee Valley Authority, which shall be solely responsible for implementing the provisions of this Act with respect to its contracts.

Approved May 21, 1982.

LEGISLATIVE HISTORY—S. 1131 (H.R. 4709):

HOUSE REPORT No. 97-461 accompanying H.R. 4709 (Comm. on Government Operations).
SENATE REPORT No. 97-302 (Comm. on Governmental Affairs).
CONGRESSIONAL RECORD:
Vol. 127 (1981): Dec. 15, considered and passed Senate.
Vol. 128 (1982): Mar. 23, H.R. 4709 considered and passed House, proceedings vacated and S. 1131, amended, passed in lieu.
May 11, Senate concurred in House amendments.

APPENDIX B: OMB CIRCULAR NO. A-125

EXECUTIVE OFFICE OF THE PRESIDENT

OFFICE OF MANAGEMENT AND BUDGET

WASHINGTON, D.C. 20503

August 19, 1982 Circular No. A-125

TO THE HEADS OF EXECUTIVE DEPARTMENTS AND ESTABLISHMENTS

SUBJECT: Prompt Payment

1. Purpose. This Circular prescribes policies and procedures to be followed by executive departments and agencies in paying for property and services acquired under Federal contract.

2. Background. The Prompt Payment Act (P.L. 97-177) requires Federal agencies to pay their bills on time, to pay interest penalties when payments are made late, and to take discounts only when payments are made within the discount period. Section 2(a)(1) of the Act requires the Director of the Office of Management and Budget to issue implementing regulations. Implementation will result in timely payment, better business relationships with suppliers, improved competition for Government business, and reduced costs to the Government for goods and services. Implementation must be consistent with sound cash management practices and related Treasury regulations.

3. Policy. Agencies will make payments as close as possible to, but not later than, the due date, or if appropriate, the discount date. Payment will be based on receipt of proper invoices and satisfactory performance of contract terms. Agencies will take discounts only when payments are made within the discount period. When agencies take discounts after expiration of the discount period or fail to make timely payment, interest penalties will be paid. Agencies will pay interest penalties without the need for business concerns requesting them, and will absorb interest penalty payments within funds available for the administration or operation of the program for which the penalty was incurred.

4. Definitions. For the purposes of this Circular, the following definitions apply:

a. Agency -- has the same meaning as the term "agency" in Section 551(1) of Title 5, United States Code, and also includes any entity (1) that is operated exclusively as an instrumentality of such an agency for the purpose of administering one or more programs of that agency, and (2) that is so identified for this purpose by the head of such agency. The term agency includes military post and base exchanges and commissaries, but does not

include the Tennessee Valley Authority, which is exempted from coverage by this Circular under the provisions of the Prompt Payment Act.

b. Applicable interest rate -- the interest rate established by the Secretary of the Treasury under Section 12 of the Contract Disputes Act of 1978 (41 U.S.C. 611) and published in the Federal Register. This rate is referred to as the "Renegotiation Board Interest Rate," and is published semiannually on or about January 1 and July 1.

c. Business concern -- any person or organization engaged in a profession, trade, or business; and not-for-profit entities (including State and local governments, but excluding Federal entities) operating as contractors.

d. Contract -- any enforceable agreement, including rental and lease agreements and purchase orders, between an agency and a business concern for the acquisition of property or services.

e. Designated payment office -- the place named in the contract for forwarding of invoices for payment, or in certain instances, for approval.

f. Due date -- the date on which Federal payment should be made. Determination of such dates is discussed in Section 7 of this Circular.

g. Discount date -- the date by which, if payment is made, a specified discount can be taken.

h. Payment date -- the date on which a check for payment is dated or a wire transfer is made.

i. Proper invoice -- a bill or written request for payment provided by a business concern for property or services rendered. A proper invoice must meet the requirements of Section 6.b. of this Circular.

j. Receipt of invoice -- the later of:

-- The date a proper invoice is actually received in the designated payment office, or

-- The date on which the agency accepts the property or service.

k. Receiving report -- written evidence of acceptance of property or services by a Government official. Receiving reports must meet the requirements of Section 6.c. of this Circular.

5. Responsibilities. Each agency head is responsible for assuring timely payments and the payment of interest penalties where required. Each agency head will issue internal instructions, as necessary, to implement this Circular by October 1, 1982. Such instructions will include provisions for determining the causes of any interest penalties incurred, and for taking necessary corrective or disciplinary action. Inspectors General and internal auditors will make reviews of implementation, as they and the agency head deem appropriate.

6. Payment Standards. Payments will be made as close as possible to, but not later than, the due date, consistent with Treasury regulations (I Treasury Fiscal Requirements Manual 6-8040.20). To establish adequate documentation to support payment of interest penalties, the following information must be included in contracts, invoices, and receiving reports.

a. A contract must include the following payment provisions:

-- Payment due date(s).

-- Separate payment dates if partial payment is provided for partial executions or deliveries.

-- If applicable, a statement that the special payment provisions of the Packers and Stockyard Act of 1921 (7 U.S.C. 182(3)) or the Perishable Agriculture Commodities Act of 1930 (7 U.S.C. 499a(4)) applies.

-- A stated inspection period following delivery, where necessary, for Federal acceptance of property or services.

-- Name where practicable, title, phone number, and complete mailing address of officials of the business concern, and of the designated payment office.

b. A proper invoice must include:

-- Name of the business concern and invoice date.

-- Contract number, or other authorization for delivery of property or services.

-- Description, price, and quantity of property and services actually delivered or rendered.

-- Shipping and payment terms.

-- Other substantiating documentation or information as required by the contract.

-- Name where practicable, title, phone number, and complete mailing address of responsible official to whom payment is to be sent.

Notice of an apparent error, defect, or impropriety in an invoice will be given to a business concern within 15 days of receipt of an invoice (3 days for meat or meat food products and 5 days for perishable agricultural commodities) and suitably documented.

c. A receiving report must include:

-- Contract or other authorization number.

-- Product or service description.

-- Quantities received, if applicable.

-- Date(s) property or services accepted.

-- Signature, printed name, title, phone number, and mailing address of the receiving official.

Agencies will ensure that receipt and acceptance are executed as promptly as possible. Receiving reports will be forwarded in time to be received by the designated payment office by the fifth business day after acceptance, unless other arrangements are made. Designated payment offices will stamp receiving reports and invoices with the date received in that office.

d. Checks will be mailed or transmitted on or about the same day for which the check is dated.

7. Determining Due Dates. Payment will be made as close as possible to, but not later than, the thirtieth day after receipt of a proper invoice as defined in Section 4.i. of this Circular, except as follows:

-- When a specific payment date is provided for in the contract, payment will be made as close as possible to, but not later than, that date.

-- When a time discount is taken, payment will be made as close as possible to, but not later than, the discount date. Discounts will be taken whenever economically justified. (See I Treasury Fiscal Requirements Manual 6-8040.30.)

-- Payment for meat or meat food products, as defined in Section 2(a)(3) of the Packers and Stockyard Act of 1921 (7 U.S.C. 182(3)), will be made as close as possible to, but not later than, the seventh day after the date of delivery.

-- Payment for perishable agriculture commodities, as defined in Section 1(4) of the Perishable Agriculture Commodities Act of 1930 (7 U.S.C. 499a(4)), will be made as close as possible to, but not later than, the tenth day after the date of delivery, unless another date is specified in the contract.

8. Interest Penalty Requirement.

a. An interest penalty will be paid automatically when all of the following conditions are met:

-- There is a contract or purchase order with a business concern.

-- Federal acceptance of property or services has occurred and there is no disagreement over quantity, quality, or other contract provisions.

-- A proper invoice has been received (except where no invoice is required, e.g., some periodic lease payments) or the agency fails to give notice that the invoice is not proper within 15 days of receipt of an invoice (3 days for meat or meat food products, and 5 days for perishable agricultural commodities).

-- Payment is made to the business concern more than 15 days after the due date (3 days for meat or meat food products, and 5 days for perishable agricultural commodities).

b. An interest penalty will also be paid when an agency takes a discount after the discount period has expired, and fails to correct the underpayment within 15 days of the expiration of the discount period (3 days for meat and meat food products, and 5 days for perishable agricultural commodities).

c. Interest penalties are not required when payment is delayed because of a disagreement between a Federal agency and a business concern over the amount of the payment or other issues concerning compliance with the terms of a contract; nor are they required when payments are made solely for financing purposes, payments are made in advance, or for a period when amounts are withheld temporarily in accordance with the contract. Claims concerning disputes, and any interest that may be payable with respect to the period while the dispute is being settled, will be resolved in accordance with the provisions in the Contract Disputes Act of 1978 (41 U.S.C. 601 et. seq.).

9. Calculation of Interest Penalties. Whenever a proper invoice (or periodic payment where no invoice is required) is paid after the due date plus 15 days (except 3 days for meat and meat food products, and 5 days for perishable agricultural commodities), interest will be included with the payment at the interest rate applicable on the payment date. Interest will be computed from

the day after the due date through the payment date and the amount will be separately stated on the check or accompanying remittance advice. Adjustments will be made for errors in calculating interest, if requested. When an interest penalty that is owed is not paid, interest will accrue on the unpaid amount until paid. Interest penalties remaining unpaid for any 30-day period will be added to the principal, and interest penalties, thereafter, will accrue monthly on the total of principal and previously accrued interest.

-- When an agency takes a discount after the discount period has expired, the interest payment will be calculated on the amount of the discount taken, for the period beginning the day after the end of the specified discount period through the payment date.

-- When an agency fails to make notification of an improper invoice within 15 days (3 days for meat or meat food products, and 5 days for perishable agricultural commodities), the number of days allowed for payment of the corrected, proper invoice will be reduced by the number of days between the fifteenth day and the day notification was transmitted to the business concern. Calculation of interest penalties, if any, will be based on an adjusted due date reflecting the reduced number of days allowable for payment.

Interest penalties under the Prompt Payment Act will not continue to accrue (1) after the filing of a claim for such penalties under the Contract Disputes Act of 1978, or (2) for more than one year. Interest penalties of less than one dollar need not be paid.

10. Grant Recipients. Recipients of Federal assistance may pay interest penalties if so specified in their contracts with business concerns. However, obligations to pay such interest penalties will not be obligations of the United States. Federal funds may not be used for this purpose, nor may interest penalties be used to meet matching requirements of federally-assisted programs.

11. Reporting. Each Federal agency will report to the Director of OMB within 60 days after the end of each fiscal year, beginning with Fiscal Year 1983, the following information:

-- Number of interest penalties paid.

-- Amount of interest penalties paid.

-- Relative frequency, on a percentage basis, of interest penalty payments to the total number of payments.

-- Number, total amount, and relative frequency, on a percentage basis, of payments made 5 days or more before the due date, except where cash discounts were taken.

-- Reasons that interest penalties were incurred.

-- An analysis of the progress made from previous years in improving the timeliness of payments.

In order to minimize the cost of reporting, statistical sampling may be used to derive the information above.

12. Additional Provisions. Additional procurement guidelines and requirements are set forth in applicable acquisition regulations.

13. Effective Date. This Circular is effective on publication. Interest penalties will apply to payments made under contracts issued on or after October 1, 1982.

14. Inquiries. Questions or inquiries may be directed to the Financial Management Division, Office of Management and Budget, Washington, D.C. 20503, telephone number 202/395-4773. Inquiries concerning the applicable interest rate may be directed to the Appropriation and Investment Branch, Department of the Treasury, telephone number 202/566-5651.

15. Sunset Review Date. This Circular will have an independent policy review to ascertain its effectiveness three years from the date of issue.

David A. Stockman
Director

APPENDIX C

TABLES 1 THROUGH 5

TABLE 1

District	$ Subject to PPA (000) FY83	Total #Invoices FY83	# Accounts Payable Personnel Authorized	Average # of Invoices Per Person Per Month
1	149,787	92,977	11	704
2	28,121	30,000	4	625
3	44,213	34,260	8	357
5	33,110	64,116	11	486
7	33,576	87,600	11	664
8	39,043	75,416	8	786
9	29,299	59,196	7	705
11	11,400	20,160	5	336
12	21,231	63,380	6	880
13	53,690	39,612	6	550
14	14,213	13,641	5	227
17	47,300	39,561	3	1099

TABLE 2

District	# Invoices Paid Early	Multiple Regression of # of Invoices Paid Early	$ Amount of Early Payments (000)	Multiple Regression of $ Amount Paid Early (000)
1	3,719	27,590	1,765	9,578
2	22,200	16,545	4,165	11,916
3	17,130	14,168	9,149	5,968
5	30,776	19,687	7,516	5,382
7	28,032	26,118	6,771	8,796
8	43,741	25,438	24,918	11,951
9	14,207	21,883	6,951	11,235
11	4,032	12,965	2,710	8,844
12	29,154	23,914	4,867	13,485
13	24,559	17,406	27,477	10,029
14	4,365	11,180	3,671	7,896
17	15,033	20,066	20,050	14,948

AD-A148 790 FY83 PROMPT PAYMENT ACT PERFORMANCE(U) NAVAL POSTGRADUATE SCHOOL MONTEREY CA R W FREITAS JUN 84 2/2

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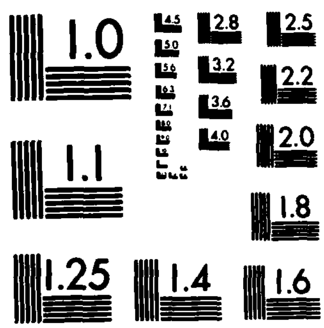

MICROCOPY RESOLUTION TEST CHART
NATIONAL BUREAU OF STANDARDS-1963-A

TABLE 3

District	Avg. # Days Invoices Paid Early(5 Days or More)Before Due Date	Cost of Early Payments to Treasury (10% Discount) (000)	Ratio of $ Paid Early to $ Subject to PPA (%)	Ratio of # of Invoices Paid Early to Total # of Invoices (%)
1	7	3.4	1.2	4
2	12	13.7	14.8	74
3	16	40.1	20.7	50
5	6	12.4	22.7	48
7	5	9.3	18.5	32
8	9	61.4	63.8	58
9	9	17.1	23.7	24
11	9	6.7	23.7	20
12	7	9.3	22.9	46
13	15	112.9	51.1	62
14	12	12.1	25.8	32
17	7	38.5	42.4	38

TABLE 4

District	$ Amount of Interest Penalties	Multiple Regression of $ Amount of Interest Penalties	# of Rptd. Interest Penalties	Multiple Regression of # of Interest Penalties
1	248	16,139	6	1784
2	8,028	10,184	1,500	1,010
3	9,180	3,125	122	180
5	11,383	6,623	1,453	627
7	871	14,365	12	1,568
8	62,859	16,695	7,348	1,831
9	5,172	13,463	619	1,431
11	399	4,823	44	366
12	7,707	16,957	430	1,849
13	12,597	9,121	1,025	896
14	1,377	2,674	124	104
17	9,803	15,451	608	1,645

TABLE 5

District	Ratio of # of Interest Penalties to Total # Invoices (%)	Ratio of $ Interest Penalties to $ Subject to PPA (x 10^{-5})
1	.01	.2
2	5.00	28.6
3	.36	20.8
5	2.27	34.4
7	.01	2.4
8	9.74	161.0
9	1.05	17.7
11	.22	3.5
12	.68	36.3
13	2.59	23.5
14	.91	9.7
17	1.54	20.7

APPENDIX D

NAVCOMP NOTE 7200 7 FEB 1983
REASON CODES

<u>General</u>. The following one-character alphabetic codes are used to identify the primary reason that an interest payment was made. This reason code always appears in the first portion of the cost code field in the accounting classification. The unit identification code (UIC) of the responsible activity is reflected in the property accounting activity (PAA) field.

<u>Reason Codes</u>.

A Contract not available

B Receiving documentation delay

C Certification delay

D Paying Office delay

E Military exercise in progress

F Discount taken in error

G Delay in returning defective invoice

H Automated system delay

J Postal Service delay

K All others

<u>Assignment Criteria</u>.

A. Contract, including amendments, not available in paying office. This is the responsibility of the

contracting office. This code will be used if the request for the missing document was made ten or more calendar days prior to the expiration of the applicable grace period, and the document has not been received by the close of business of the sixth working day preceding the last day of the grace period.

B. Receiving documentation delay by the receiving activity. This is the responsibility of the receiving activity. This code can be used under two different circumstances:

1. A request for the missing documentation was placed ten or more calendar days prior to the expiration of the applicable grace period and the required documentation had not been received prior to close of business on the sixth working day preceding the last day of the grace period.

2. More than five working days elapsed between the date of acceptance of the goods and services and the receipt in the paying office of the approved invoice and receiving report, and this delay allowed the paying office less than fifteen calendar days to effect payment prior to the expiration of a fifteen day grace period (five or more calendar days prior to the expiration of shorter grace periods).

C. Delay to obtain required certification of invoice. This is a receiving activity responsibility. It applies only when the contract provided for a specified period of time to accept the goods or services, this time period was exceeded, and the paying office was permitted fifteen calendar days or less to effect payment without incurring interest charges.

D. Delayed by paying office. This is a paying office responsibility. This code is used whenever either of the following two circumstances apply:

1. A bill properly payable was received fifteen calendar days or more prior to the expiration of the fifteen day grace period or five calendar days or more prior to the expiration of the shorter grace periods.

2. The provisions of Codes A, B, C, or E would have applied except that the properly payable bill was received in the paying office prior to the time specified in the description of these codes.

E. Military exercise in progress. This code is proper for use only in peace time when the activity cannot be contacted by the paying office for information necessary to effect payment (accounting data, certification of receipt) due to the restrictions on the use of telephone or message communication, and the request is sent by mail at least ten

calendar days prior to the expiration of the grace period, and the information when obtained by mail or after lifting the restrictions is received after the close of business on the sixth working day preceding the last working day of the grace period.

F. Discount taken in error. This is a paying office responsibility, except when the receiving activity supplies an erroneous date upon which the paying office relies in taking the discount. The code is used whenever it has been determined that a discount was wrongfully taken, and full payment was not made within the specified period.

G. Failure to notify vendor of defective invoice. This code can apply to either the receiving activity or the paying office. In either instance it applies only if the number of calendar days between the date of the invoice receipt and the date of the rejection exceeds the maximum allowable number (fifteen in most cases), and that this excess is equal to or greater than the number of calendar days by which actual payment exceeded the expiration of the grace period.

H. Automated system processing delay. In order for this code to be appropriate, the documented delay in calendar days must equal or exceed the number of calendar

beyond the expiration of the grace period on which payment was made.

J. U.S. Postal Service delays. This code applies only if none of the circumstances described in any of the other codes apply and there is at least a seven calendar day gap between the documented mailing of the invoice by one activity inside the United States and the documented receipt of that same invoice by another activity in the United States, and payment exceeds the grace period by four days or less. If either the sending or receiving activity is outside the United States, the documented mailing time must be at least fifteen days, and the payment date must be no more than eight calendar days beyond the expiration of the grace period.

K. All others. This code can be used at the discretion of the paying office, and may go so far as to include instances in which the facts lack sufficient clarity to permit a determination of why the payment was late. Any use of this code must be thoroughly documented by the paying office and available for inspection upon request.

The following table was constructed using data supplied by the accounting section at Headquarters, U.S. Marine Corps.

Late Payments by Reason Codes - Fiscal Year 1983 - USMC

Reason Code	Number of Late Payments	Percentage
A	55	.01
B	6317	.68
C	80	.01
D	826	.09
E	0	0
F	1	0
G	2	0
H	12	0
J	729	.08
K	1212	.13
Totals	9234	1.00

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